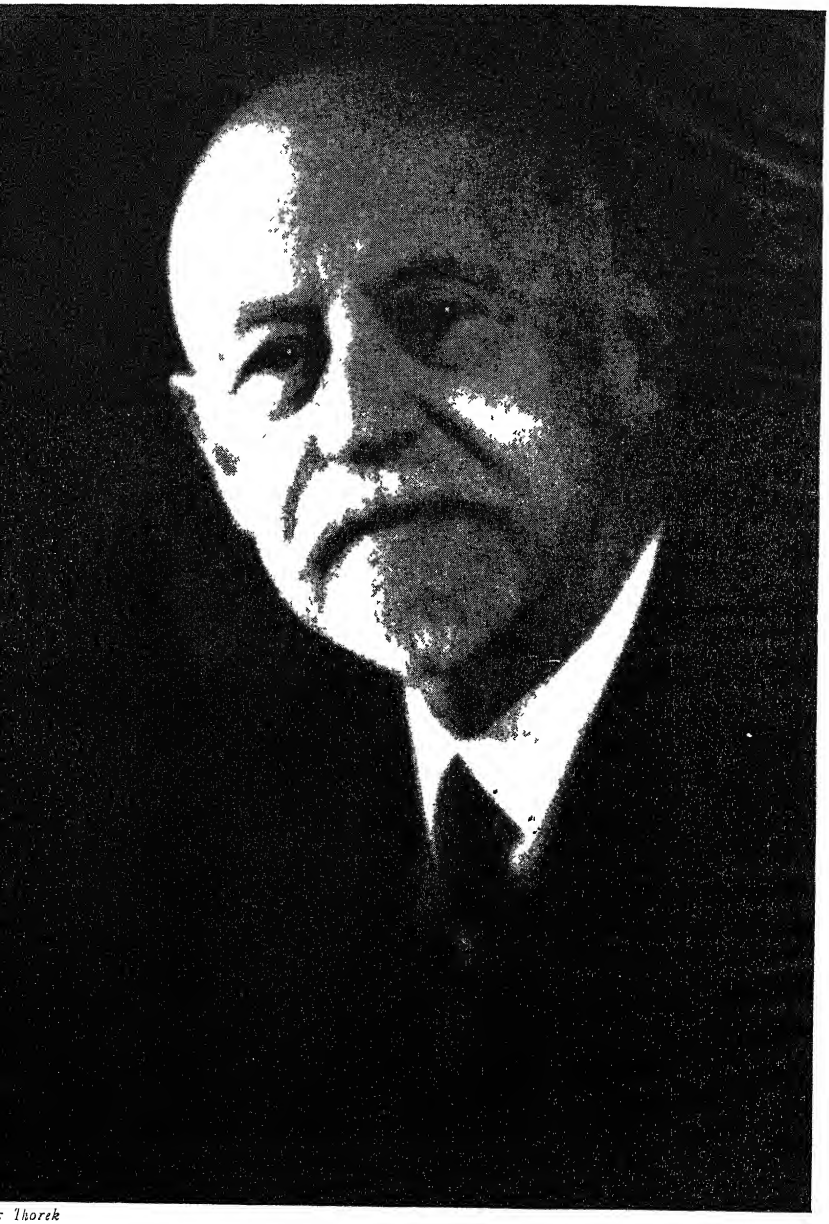
MEMORIES
OF
EIGHTY YEARS



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JAMES B. HERRICK AT SEVENTY-FIVE

MEMORIES OF EIGHTY YEARS

By

James B. Herrick

THE UNIVERSITY OF CHICAGO PRESS

To

Z. D. H.

INTRODUCTION

THE purpose of this autobiography is to show, by telling my experiences in boyhood, medical school, hospital, practice, medical teaching and writing, how the average youth of my time with his heart set on a medical career developed into the practitioner of medicine—the clinician. I have tried to be accurate. For facts I have often depended on letters, old records, and previous writings. Undue reliance on memory, which is notoriously treacherous, has been avoided. I trust the opinions expressed may be unprejudiced. There is at least a long detachment in time which has a sobering influence on judgment and lends a truer perspective to one's vision. Mr. Dooley has a wise comment along this line: "Th' further ye get away fr'm anny peeryod, th' better ye can write about it. Ye aren't subject to interruptions by people that were there. . . . Many a man that cuddent direct ye to the dhrug store on th' corner whin he was thirty, will get a respectful hearin' whin age has further impaired his mind."

It is to be hoped not only that the book will appeal to physicians but that laymen also may be interested. Perhaps, too, its pages may contain material that may be of use to some investigator of the future who is trying to understand the conditions of medical education and practice that prevailed in the eight decades with which it is concerned.

I wish to acknowledge my indebtedness to a few of the many friends who have assisted in the preparation of this book: Dr. Stanley Pargellis, of Newberry Library, and Dr. Ernest E. Irons read the first draft of the manuscript and made helpful comments. Miss Salmonsen, of the Crerar Library; Miss Carr, of the Church Library of Northwestern University; Miss Riecker, of the Library of Rush College and Presbyterian Hospital, were

most generous of their time in looking up references and in securing photographs from which illustrations could be made. I am especially grateful to my wife, my most understanding and impartial critic, for her wise and constructive judgments passed on the manuscript.

JAMES B. HERRICK

CHICAGO, ILLINOIS
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CHAPTER I

Boyhood

Ah! happy years! Once more who would not be a boy again.

BYRON, *Childe Harold*

I WAS born in the village of Oak Park, Illinois, on August 11, 1861, the oldest son of Dora and Orrigen White Herrick. My mother's maiden name was Kettlestrings. This odd name probably indicates that at least one of my ancestors was a bookbinder; the "kittlestring" is the thread or string that ties together a certain number of sheets of a book.

My earliest recollection is that of watching, from a window in Chicago, the funeral procession of Abraham Lincoln as it solemnly moved through the streets in April, 1865. I recognized an uncle of mine among the marchers and called out to him but was promptly hushed to quiet by Mother. That a child of three years and eight months could even faintly remember such an incident may seem strange to some. But the black drapery of horses and catafalque, the rosette of black ribbon on my uncle's coat, the sharp calling-down by Mother at my childish outcry—these are details in the otherwise dim picture that make me sure this cherished memory is genuine.

A clearer war memory is that of the fair of the Sanitary Commission, held in Chicago in the summer of 1865—it was called the "Northwestern Sanitary Fair." It is a hot day, and I am looking at the tame, bald-headed eagle, "Old Abe," the famous mascot of the eighth regiment of Wisconsin Infantry. A soldier with a palm leaf fans the big bird, who sits on a perch. Old Abe, to get the full benefit of the cooling current of air, flaps his wings and spreads them wide. The sight is thrilling to a boy of four.

My impression of it was so vivid that I would have retained it even without the help of the colored print that Father bought for me.

In our village the war spirit did not die out with Appomattox. My school days began in September, 1868. At that time the children still sang "Marching through Georgia" and spoke pieces like "All quiet along the Potomac tonight." A song I must have heard at school ended with the refrain. "While we tear down the rebel flag that flaunts the triple bars."

Mother's parents came, with an infant child, from Yorkshire, England, before they were thirty years old. They arrived at Baltimore in a sailing vessel. They went on to Cincinnati by way of the Baltimore and Ohio canal, stage, and the Ohio River. After one year in Cincinnati, during which another child was born, they went by covered wagon, the "prairie schooner," to Chicago. Grandfather joined with another Englishman in running a sawmill located on the east bank of the Des Plaines River, a little north of where Lake Street crosses that stream. He hauled to Chicago the lumber used in the construction of the first bridge across the north branch of the Chicago River. The route of the old lumber road through the forest in north Oak Park was plainly marked when I was a boy. We called it the "Indian Trail"—perhaps it had been that originally.

Grandfather Kettlestrings was a hard worker and a far-sighted man. In 1837 he bought from the government for a dollar and a quarter an acre, one hundred and seventy-five acres of land that now includes some of the most valuable property in Oak Park. I have the original patent signed by the agent of Martin Van Buren. Grandfather lived to sell much of this property by the front foot. After he retired, he took an active part in the development of the village and the West Side of Chicago. He was a pillar of the Methodist church. For years he was looked upon as the leading citizen of the village. Neither during his life nor afterward did I ever hear a whisper against his character.

Father's forebears came from England to Beverly, Massa-

chusetts, in 1630. Grandfather Herrick was proud, even to vanity, of his family, especially of the Revolutionary War record of his father. He was industrious, energetic, full of fun, generous to a fault. His wife, one of sixteen children, was dignified, kindly, competent; beloved and revered by her children. I knew all four of my grandparents when they were in their sixties to eighties. I sometimes wondered what they had been in their younger days, whether there was any wildness connected with the wanderlust and the abundant energy that made them prosperous and highly respected citizens in their communities.

In 1870 Oak Park had a population of about one thousand. At that time we lived in a small frame house, the gift of Mother's father, which stood where now the Baptist Church is located, at the northwest corner of Oak Park Avenue and Ontario Street. Though the house was well built, living conditions were primitive. For long the house was heated by wood stoves. There was no plumbing. The drinking water came from an outside well with chain-and-bucket pump, replacing one with a windlass and bucket. The wash water, collected from the roof, was stored in a cement-lined cistern under the kitchen. In winter we often melted snow to piece out when the water was low. We were cold in winter in spite of banking up around the house with leaves, straw, and manure, and of calking the windows. Flies and mosquitoes were a pest in summer.

Like most of the children in the community, we were brought up to help about the house not as a matter of punishment but as a matter of course; it was a part of the day's program. One of my earliest tasks was to help care for the baby, to see that he didn't get burned on the stove, or to rock the cradle—this was not prohibited then by ultra-scientific pediatricians or psychologists. Once one of the members of the infant class in the Sunday school, asked how he was useful in the home, replied: "I hand diapers."

Later came the running of short errands, putting the napkins on the table, polishing the silver, bringing in kindling. As we

grew older, there were outdoor tasks, such as feeding the chickens, throwing down hay for the horse and cow, or light work in the garden. The Colorado beetle, or potato bug, arrived when I was a boy. A daily task before going to school was to take an old milk pan and a kitchen spoon and knock the beetles and worms into the pan, pinch off the leaves with the eggs, and then bring the catch to Mother, who poured boiling water on it. When Paris green appeared, this disagreeable but necessary labor was lightened. Later, I cared for the horse, the cow, and the pig, as well as for the chickens and pigeons, the latter my own pets. I learned to milk the cow when I was twelve. In summer she had to be led or driven to pasture two blocks away. Occasionally, I varied the program by mounting her broad back and, much to the amusement of the neighbors, was carried sedately by the gentle creature to her feeding ground, the way to which she knew well. This was work, but it was fun. When I was about fourteen I helped the hired man, Charlie Quandt, bind and thresh a field of oats. He made me a light flail and said with pride: "Shimmy he vork mit me like a man."

A job I always enjoyed was cleaning up the yard, in which there was a thick growth of trees, mostly oaks and hickories. Even today the smell of burning leaves recalls the joy with which in spring and autumn I gathered the leaves, dead grass, branches, and other rubbish into a huge pile. In the evening I touched the match and tended the glorious bonfire. It's a mighty mean man who gets the small boy to help him gather leaves and brush for a bonfire and then says, "Now, sonny, stand 'way back so you don't get burned," while he himself touches the match to the pile.

In the earlier years we made soft soap and even smoked our own ham. Those were great days when I was intrusted with the care of the fire under the big iron kettle in which that loathsome mess of scrap bones and fat was boiled for soap; or when I was permitted to open the smokehouse door and, coughing and with watery eyes, throw chips and bark onto the smoldering fire, in the smoke of which the hams were being cured. But

I did not relish the late-winter job of picking over the potatoes and apples that showed decay. That cellar in the old house! It was a godsend to the family. It didn't freeze. It stored the canned goods. But it was dark and damp, and how it did smell! Each fall Father laid in about five barrels of apples, one or two of greenings as cooking apples, a barrel each of Spitzenburgs and Baldwins, and often one of Northern Spies or perhaps russets. Several bushels of potatoes were in the bin. There were squash, pumpkins, beets, and, of course, cabbages and onions; a kit of of mackerel; perhaps a small barrel of salt pork or a crock of pickles. In the cellar stairway hung a salt codfish, a ham, and a piece of dried beef. It was a day of relief when in spring the cellar windows and door could be opened, and the light and fresh air sweetened the place up a little.

Our home was religious but not sanctimonious. According to present notions, we were fundamentalists, like most of the other villagers, though there were some Unitarians, some free-thinkers, and even some frank disbelievers. Sunday was not a holiday, in the modern sense, rather a holy day, a day of rest. It was serious and meditative but not mournful.

After Sunday breakfast there were baths for the grown-ups—the children had been bathed the night before. Baths were taken in the kitchen or sitting-room or downstairs bedroom, in wooden washtubs filled with water heated in the clothes boiler on the kitchen stove. Then came church, Sunday school, and a big dinner, followed by Scripture reading and family prayers. There were regular Sunday naps, letter-writing, occasionally a walk. Except for necessary housework and the care of the animals in the barn, no work was thought of, no study, no reading of light fiction, no sewing or fancywork, no game of any sort. Yet we were happy.

As I look back to these years, no feature stands out more clearly than that of my boyhood games and sports. I have a remembrance of cutting dolls and odd geometrical figures from paper; of working bookmarks on perforated cardboard; of crocheting and knitting a little. On rainy Saturdays we played

house or school or doctor or store. Not until many years later did I realize what a patient, wise, resourceful, and understanding mother I had. Her own work demanded most of her time. Yet on her busiest day she kept her three or four children, and often two or three of the neighbors' children, pleasantly occupied. If we played house, we had a real live baby to take care of. If we played store—Father was then the village grocer—the living-room chairs were rearranged, the extra leaves from the dining-room table were commandeered to make counters. I, as the oldest, was storekeeper. And Mother allowed us to borrow all kinds of salable articles from her pantry, kitchen, or cellar—always on condition that everything was to be replaced after the game was over. If Father bustled in for lunch, his sputtering at the torn-up condition of the house was very soon soft-pedaled on a quiet hint from tactful Mother.

The real joy was when we played outdoors. There were no orders to keep off the grass. In fact, our lawn, if it might be called such, was badly torn up where we hopped, skipped, and jumped and pitched horseshoes—"quates" we called the game, a corruption of "quoits." The lawn had deep pockets and bare spots about the big swing, the turning pole, the trapeze. The path from the side door to the gate was full of holes because it was used for marbles and as an alley for practicing at pitching baseball. I pitched, and Willis, four years younger, caught.

I was short, chunky, and strong for my age. I excelled in running and was a quick dodger. I could skate fast, though not gracefully. I could throw a ball swift and straight and was a good marksman with a slingshot. When sides were chosen, I was among the first to be picked for shinny, snowball fights, rough-and-tumble football, "sting goal," or prisoner's base. But in baseball or cricket—unless it were as pitcher or bowler—I I was among the last, for I was poor at catching or batting; I was of little worth except to chase or "shag" balls in the field. I swam only fairly well. I was only average or below in playing marbles, in making kites or ice boats. And if a ball had to be rescued from the eaves trough, it was Fred Wood who, though

he had an artificial leg, was able to walk from the ridgepole right down to the edge of the roof, stoop, pick out the ball, and walk back to the peak, sure-footed and erect. My own attempts at such feats were laughingly poor, for I was both timid and clumsy.

Occasionally on a Saturday a group of up to forty boys, nine to fourteen years of age, would play a glorified hide-and-seek called "slip" or "guard the sheep." Sides were chosen. Bounds were staked out, sometimes including as many as six blocks. Rules were laid down: it was unfair to hide inside a house or inside a barn, though it was permissible to hide back of the building or on top of it or under it. One could hide in a ditch, in a field of grain, or in trees and among shrubbery. There were complicated rules and many heated arguments, but, by five or six o'clock, when the game was over, there had been more vigorous exercise, more training of wits in observation and Indian-like cunning, more practical lessons in how to get along with one's fellows, than are possible in present-day conditions in our urban districts. Autos, movies, bridge, dancing? Not in it with our outdoor sports of seventy-five years ago.

One minor event has caused merriment to my children and grandchildren and to some of my patients who forget that I was once young. Mr. Wood, who lived across the street, had a large house and barn and a fine vegetable garden extending down a slight slope to the next street. He had put in not only sweet corn but had quite a patch of field corn. One Saturday some four or five of us youngsters of eight to ten years played Indian in the cornfield. We had bows and blunt-headed arrows, wooden knives, feathers in our hair, tomahawks of some kind. The day was warm. We wished to resemble the Indians as closely as possible, so we shed all our clothing. We ambushed each other. We smoked the peace pipe—corn silk was plentiful. Then, seeing Charlie Waters—Mr. Wood's man-of-all-work—who was washing the carriage back of the barn and singing as he worked, we crept up on him and with a wild whoop let fly a volley of arrows. Charlie just laughed at us; we had not hit

him. But when a well-directed ripe tomato landed on his freshly cleaned carriage and another on his neck, he suddenly charged us with ripe and green tomatoes, cucumbers, ears of corn, and the like and drove us back into the corn patch and through it onto the street. Ladies happening by were shocked to see boys stark naked in the street; "You boys ought to be ashamed of yourselves!" "I'll tell your mother, Jimmie Herrick." But what could we do? Charlie held the cornfield, and it held our clothes. An armistice and finally a peace were concluded. That night, there were serious talks by our parents, who had some difficulty in keeping straight faces, and promises were made never to do such a thing again. I have kept that promise to this day.

We all respected and loved Father. He was a wonderful story-teller, had a contagious sense of humor, was affectionate, tender-hearted, and scrupulously honorable. Yet he was not a boy's pal. He rarely joined in our outdoor sports, I have no remembrance of seeing him throw or bat a ball, use the swing, try to chin on the pole, play marbles, skate or swim, or help build or fly a kite. He was not deft with tools; he tied a package clumsily. He had an intimate supervision over the barn, the hay, cow, horse, pig, and the kitchen garden. But if I wanted to go swimming or nutting or to borrow the heavy muzzle-loading double-barreled shotgun from Uncle Jim to go hunting for "med larks," I got permission from Mother. It was she who encouraged my liking for pets: pigeons, rabbits, cats, chickens. We never had a dog, since Father had a genuine fear of or antipathy to dogs. While Mother did not encourage my having white mice in my bedroom, she tolerated their odor, although she made me frequently clean out the box in which I kept them. She knew that I stored cocoons in the drawer where I kept my clothes, and she admired the beauty of the wonderful Cecropia and Polyphemus moths that hatched out in the spring; but I had to get rid of the mess of eggs plastered against the side of the drawer before the grubs hatched out among my shirts and socks.

Of course, we boys played with the girls. We wrote letters in a cipher code. There were parties with old-fashioned games,

some of which even then seemed to me very silly, like "drop the handkerchief." In our set dancing was taboo, as were cards. When Mother learned that I was playing euchre in the haymow, she said that, while she disapproved of cards, if I wished to play, I was to have the boys come into the house and play in the living-room. We tried this, but the game lost much of its attraction. I may add that Mother's notions about cards underwent a change. Before she died at ninety-six, she knew twenty-seven varieties of solitaire and played a good stiff game of five hundred.

We were good boys, at least relatively good. Yet we did certain things that our parents would have frowned upon had they known of them.

On summer evenings it was a custom to play out of doors until dark. Often from five to fifteen boys, perhaps with some of the girls, would use the swing or the trapeze in our yard, have contests in jumping or wrestling, play hide-and-seek, or pitch horseshoes. Then, when darkness came on and the younger children had been called into the house, we boys sat on the grass or lay on our backs, watching the clouds slowly lose their outlines and the stars come out. We indulged in twilight dreams. We exchanged confidences, talked of our teacher, or discussed some new book. We gossiped and told stories. Now our stories were not always parlor stories. By a strange species of irony we called them "Christian stories." They usually came from the older boys. One of these might happen along as we sat there and say, "I've got a new Christian story for you fellows. You haven't heard this one, have you?" We listened eagerly. It was anticipatory of the smoking-room in the Pullman. I believe we were not attracted to the stories primarily by their vulgarity. Even our youthful minds made a distinction between stories in which the point depended upon obscenity or profanity and those whose core was genuine wit or Chaucerian humor or that revealed the weaknesses of human nature, punctured pretense, or portrayed a situation where a man did not realize how comical he looked to others. As to oaths, few of the boys used the name of the Deity

or said "hell" or "damn." The first time I ever spoke of anyone as a "damned" rascal was when I was about eighteen. I felt immediately that I had been guilty of sacrilege. But we had milder oaths that we used freely—darn, gosh, the dickens, by heck, etc. And into our narrative and description we were prone to inject a picturesque emphasis by the use of a Rabelaisian nomenclature based on anatomic and physiologic features pertaining to both sexes, not ordinarily mentioned in print or in polite circles. Such language seems to be universal in all countries. I still believe all this was merely a manifestation of a real boy's nature.

My reading as a child was desultory. Our home library was small and strangely promiscuous. I had a few boy's books besides Oliver Optic, Horatio Alger, and Captain Mayne Reid. I read often in James Greenwood's *Wild Sports of the World*. I went through the weekly *Youth's Companion* from its first page to its last. My bible of games was *The American Boy's Book of Sports and Games*. Biography, history of events, adventures, stories, fiction appealed to me: John S. C Abbott's *History of the Civil War in America*, Irving's *Astoria*, *Tales of a Traveler*, and *Bracebridge Hall*. Some parts of *Knickerbocker's New York* were great favorites. I could not get through Irving's *Mahomet*, *Columbus*, or his books on Spain; I enjoyed Holland's *Life of Lincoln*, Carpenter's *Six Months at the White House*, John B. Gough's *Autobiography*. I devoured novels, many of them in the then popular paper-covered "Seaside Library," ten cents a volume. Almost any story went with me—fairy tales, love stories, stories of adventure or humor, even the mawkish stuff of Mary J. Holmes. Then there were Ouida, *Handy Andy*, *Oliver Twist*, Edward Eggleston's *Hoosier Schoolmaster* and *The End of the World*. My favorite book at the age of eleven was Thomas Bailey Aldrich's *The Story of a Bad Boy*, and such it has remained for more than seventy years, not even yielding to the later allurement of *Tom Sawyer*, *Huckleberry Finn*, or *Bob, Son of Battle*.

Another type of literature I must note in passing. When it

was reported that Mr. J. Brown, the English news agent and stationer, was selling dime novels, a self-constituted committee of ladies went to him and politely but firmly informed him that in a village like Oak Park the sale of such vulgar literature would not be tolerated, it would corrupt the children, etc. But Mr. Brown was stubborn. He announced that " 'e was within 'is legal rights. If the ladies didn't wish their children to buy, they could so hinstruct them." He finally agreed to sell to no minor if he was so requested by letter from the parents. Well, the dime novels remained on sale, and many of the boys of the village read them, some with the knowledge of their parents, others clandestinely. I was of the latter group. With Fred and Ira Wood, I read them in the Wood's barn. Charlie Waters, the hired man, often chipped in a dime and became a privileged member of our group. He acted as our purchasing agent. We concealed our novels under the cushions of the rear seat of the Wood's one-horse coach, the swellest outfit in the village. It always tickled me to see Charlie sitting dignified on the front seat, prim Mrs. Wood and her sister on the rear seat—and they were in the true sense ladies and aristocratic—bowing to acquaintances as they passed. If Charlie caught sight of me on the sidewalk, he gave a comical long-drawn-out wink, as if to say, "They don't know what they're a-sittin' on, do they?" I would nearly give it all away by a grin.

Were those dime novels so bad? They were thrillers, to be sure; the heroes escaped from school, ran away to sea, encountered pirates. The melodramatic side of Jack Sheppard was stressed. There were hairbreadth escapes, scalpings by Indians. I recall an incident described in one of the ten-centers—perhaps it was in *Arkansas Sal the Woman Trapper*, a metrical title that still sticks in my memory and makes me long to see a copy today. A hunter of the plains and an Indian chief agreed to settle a dispute by a duel. It was to be the hunter's revolver against the varmint's bow with its flint-head arrow—all Indians were "varmints." The signal pistol-shot was fired, and the duelists simultaneously discharged their weapons. To the astonishment

of all, neither one was hurt. The only one injured was the white man, who, standing out of the line of fire halfway between the contestants, had fired the signal. Something plowed through his cheek. With the blood that oozed from his mouth, out came a tooth and a piece of lead. The bullet of the hunter had been cut in two by the flint of the Indian's arrow and one-half had struck the signal man. Improbable! Hairbreadth! Vicious influence! But no worse than some of Cooper, no worse than the rescue of the heroine from the charm of the rattlesnake in Simms's *Yemassee*. No worse than many of the detective and mystery stories of today.

I did not go to school until I was seven, and then unwillingly and with fear. After the first day, however, I never objected to school; in fact, I was eager to go. For the first year my teacher was a pleasing, competent young woman who understood children and who, in turn, was held by them in affectionate regard.

When I went into the "big room" where Mr. W., the principal, was in charge, I came under the tutelage of a martinet of the old fundamentalist, traditional lickin'-and-larnin' type. What I saw in that large room has made me understand the otherwise incredible story told by Anthony Trollope in his *Autobiography*, of his maltreatment in his earlier school days. One scene is indelibly fixed in my memory. On Friday afternoon we "spoke pieces" or read compositions. When Ed Russell, one of the older boys, was called, he replied that he was not prepared. He was told to go to the platform and make a bow, which he rather sheepishly did while we snickered. "No, Eddie, stay where you are; you are not through. You may speak this piece as I recite it to you: 'Twinkle, twinkle, little star, how I wonder what you are.' " Mr. W. evidently intended to hold him up to ridicule. Ed hesitated a second and then stolidly said, "I can't." "Perhaps you mean you won't," said Mr. W., warningly taking down from its hook by the blackboard the heavy hickory pointer, his favorite weapon of punishment. "Now repeat it after me." Ed's face grew white, his

lips were taut as he sulkily said, "I can't." "Eddie, hold out your hand." In the now silent room the swish of the heavy pointer was plainly heard. Ed flinched and let out a faint cry. Twice more the same sickening scene was enacted. I can still see the red welts on the hand, can see Ed pale, with sweat dripping from his face, taking his seat, burying his head in his arms on the desk, breathing hard but holding back the tears. He was a strange lad, solitary but good natured. His father took him from school and sent him to Beloit, where he found teachers who understood him. In college he led his class in Latin and Greek.

Following Mr. W. came Mr. D., who, desiring to make a record for gentleness and kindness, went to the opposite extreme and was laughed at by the pupils as an old hen. Mr. D. lasted two years, and then came a teacher who was a good executive and firm, yet kindly, with children. No licking, no softy business. Difficulties were ironed out by heart-to-heart talks with the wayward or backward child or with the parents. The teacher became the confidant of the pupil, his friend and adviser. He was called affectionately "The Brother." For years, long after I left the school and when it had grown to high-school rank, he continued to be honored and loved as "The Brother."

In spite of some minor regrets, I am thankful for my boyhood. Thankful for God-fearing ancestors whose religion, though now outmoded, made a home in which was set up a high standard of right living, a standard that involved honesty of purpose, word, and act; respect for and obedience to parents; and that inculcated habits of industry and mutual helpfulness. Thankful that I had congenial brothers and sisters and that the memory of our childhood days and of the years that followed is of almost unalloyed happiness. I am thankful for the companionship of other boys who, like myself, were neither hopelessly bad nor offensively good, boys whose moral lapses were not to be regarded as sins that left an indelible stain. I am thankful that I lived where I had intimate contact with nature—the prairie,

the clouds, the trees, the flowers, the birds, and four-footed creatures.

I am thankful for boyish dreams. I suppose all boys are more or less dreamers. I pity those who are not; they miss much pleasure and a useful training for the practical side of life. Though I lived in a world of reality, there was also a play world in which the Wind blew in the Willows and at times a something not unlike Peter Pan almost seemed a play companion. Nearly every fall I dug in the garden a hole that measured about six feet in all directions; when brother Willis grew up, he helped me. The hole was sometimes square, sometimes circular. I called it my "winter house." I covered it with planks and made a trap door. Near the bottom I scooped out a side hole to be used as a stove or fireplace, boring outside from above with a crowbar until I had a flue or chimney for my stove. Into this flue I put a stove pipe. In winter, with a foot of snow on top of the planks, what a joy it was to crawl into this den with my younger sister and brother, to start a fire and roast potatoes or toast cheese over the ventilating perforations on the sloping tin top of the old fashioned candle-lantern. Perhaps I imagined myself an Eskimo or a solitary like Robinson Crusoe. I was anything but an inhabitant of the cold world of reality that I could faintly hear blustering above me. I was in a semi-fairyland of warmth and coziness. I had the same delicious sense of comfort, so often described, that comes to the boy who, in the attic with the rain on the roof, forgets the bleak outside as he reads of the Wonderful Lamp or the human footprint on the sand or the marvelous doings that went on in the land of the Lilliputians.

In the spring, the call of the out-of-doors was irresistible. Dream life was at high tide. I secretly went to the spot where I knew there was a little colony of yellow lady's-slippers, and picked only one. I felt a sense of ownership in these orchids; the other boys didn't know about them. I waded in the ditches after frogs and crawfish. Alone or with some other lad, I built a rude raft of old posts and fence boards and poled about on the "slough" (we pronounced it like "slew"), perhaps hoisting

my jacket as a sail. It was adventure from the pages of *The Swiss Family Robinson.*

But it was the woods that made the greatest appeal. We never called it the "wood." Here was a spot of mystery and delicious emotion. The fragrance of the flowers and of the mellow earth; the whirr of wings or the scurry of some small surprised animal; the harmony of colors; the enchanting vistas seen between the boles of majestic elms and oaks and hickories; the quiet. The earth, with its thick, elastic cushion of leafy mold, was noiseless underfoot. There was no sound of hammer, no creak of wagon wheel; no human voice was heard. It was remote from man, a land of enchantment. Like a mystic of old, I was entranced. I felt—I could not understand it then nor can I explain it now—as though there were some sublime presence that spoke of things not made with hands. Perhaps it was only a dream. But is it not true that

> One impulse from a vernal wood
> May teach you more of man,
> Of moral evil and of good,
> Than all the sages can.

Men are but children of a larger growth. Time modifies much of our childhood's faith and practice. Yet may we not with profit cling to some of our boyhood ideals? To our belief in the rightness of honesty, the dignity of labor, the worth of family affection, the beauty of friendship with the living, the value of companionship with the dead as revealed by their records in books, the inspiration that comes from communion with nature? Yes; may we not still dream? Sometimes the meaning of life seems clearest when, as in boyhood days, we get away from reality and dream.

CHAPTER II

Away at School

And gladly wolde lerne.
CHAUCER

THERE are two events that are indelibly impressed on my memory. The first was the great Chicago fire of 1871. In the evenings of October 9 and 10, 1871, a bright glow hung over the burning city, eight miles to the east. We children were much excited whenever we noticed a particularly brilliant light or saw actual flames shoot upward. We were told that it meant the collapse of some big building.

It must have been on the afternoon of the tenth that some of us boys went to the Northwestern Railway station in Oak Park to see the "Sterling Passenger" come in from the city. The train was late, pulled in slowly, and had many more coaches than usual, which were packed. Passengers were standing in the aisles, on the platforms, and on the steps of the cars. As the imposing, dignified Rev. Joseph E. Roy stepped off the car, his face begrimed with smoke and dirt, I heard him say with deep solemnity: "An appalling calamity! An appalling calamity!" His set face and these grim words did more to make me realize how overwhelming had been the disaster than did newspaper accounts or stories told by others, or even what I myself actually saw when, some ten days later, I accompanied Father in a drive through the burned district. On that trip it was not so much the ruin and devastation that impressed me, a boy of ten,

as the huge barracks made of unpainted boards, hastily erected on the West Side to house thousands of homeless for the oncoming winter. Besides, there were the Army tents, where Phil Sheridan's soldiers were encamped. After the fire the city was under martial law for several days, with General Sheridan in command.

As soon after the fire as it was deemed safe, Oak Park citizens, especially the housewives, collected sandwiches, crackers, hard-boiled eggs, milk, coffee, and other suitable foods to send to the sufferers. The baskets and boxes filled Father's covered delivery wagon to the top. He and A. T. Hemingway—Ernest Hemingway's grandfather, who was then secretary of the Chicago Y.M.C.A.—drove through the still hot streets to the sands of the lake shore on the North Side and distributed the food. Father, who was easily upset, broke down that evening as he recited to us the events of the day. He had seen hungry women and children, had met men whom he had known in business. "They were starving," he said, "they wept, they kissed my hand"—he could not finish.

The second event was a trip with Father to the Centennial Exposition in Philadelphia in the summer of 1876. On the way we stopped in Washington, where we were fortunate in having as a guide a friend who had been a cavalry officer in the Civil War and who at the time was stationed in that city. He saw to it that we shook hands with President Grant, Senator John A. Logan, and other notables. The crowning event was a call on William Tecumseh Sherman, who was then General of the Army. Cards were sent into the General's office—Lieutenant A. R. Sabin, O. W. Herrick and son, all of Oak Park, Illinois. We were ushered in promptly. General Sherman, grizzled and looking exactly as in his pictures, was in civilian dress. As we entered, he turned in his swivel chair and addressing the cavalry officer said: "Ah, you must have been at one time under McPherson," which the lieutenant said was correct. Then, turning: "Mr. Herrick and son?" "General," said Father, "I have seen you on foot and on horseback and would not presume to take

your time just for another look at you, but my son is eager to see you." The General turned toward me, held out his hand, and with a twinkle in his eye said; "My son, I am very glad to meet you"—with a little emphasis on the "you." Father, laughing at the joke at his own expense, added, "My son has read a great deal about the war and. . . ." The General, interrupting, said seriously, "My boy, that is the best way to learn about war —read about it." It was another version of his famous epigram, "War is hell."

In 1877 two other boys and I were graduated in the first class ever sent out from the Oak Park High School. The course of study was so incomplete that, in order to enter college, it was necessary to do additional work in a preparatory school. Lyman Abbott tells how his father used to say that it was "an excellent plan for a boy to go to college, but a very poor plan for a boy to be sent." Somehow, it was all along taken for granted that I was to go; I was sent, but I went gladly. It was also taken for granted that my studies should be for the classical course, the one including Latin and Greek.

Rock River Seminary at Mount Morris, Illinois, was chosen by Father as a preparatory school. It was only one hundred miles from Oak Park; its fees were not high; expenses would be low in the small village; and there would be fewer temptations to lead a boy astray than in a larger place. The seminary had been established in 1837 as the school of the Rock River Conference of the Methodist Church. Among its graduates were many ministers, and laymen of note like Shelby M. Cullom, John L. Beveridge, General John E. Rawlins, Robert R. Hitt, Judge Merritt Pinckney, and Drs. E. Fletcher Ingals and Sarah Hackett Stevenson of Chicago.

Since 1871, when the seminary had been sold by the church, it had been run as a private school by Mr. D. But, owing probably to the improvement in the public grade and high schools in the territory, the number of students had become fewer until now there were only about one hundred and fifty. These were largely farmers' boys, who came late in the fall to take courses

in practical subjects like grammar, geography, bookkeeping, etc. A much smaller number, perhaps fifteen to twenty, were preparing for college. These were mostly men who by hard work had saved enough money for their courses and who, because of their age—most of them well over twenty—did not care to go to a high school.

Mount Morris, with its twelve hundred inhabitants, was the market center and shipping point for a prosperous community of farmers, among whom were many thrifty Dunkards. There were grocery, dry-goods, and clothing stores and a barber-shop. The blacksmith, the dealer in lumber, and the hardware merchant did a thriving business. There were no saloons. On Saturdays the streets were crowded with wagons and buggies, and there was much buying, visiting, and gossip.

Though from a suburb of a large city, I fitted well into the small-country-town picture. I wore ready-made clothes and paper collars. My expense account shows little spent for barbering, shoe polish, or laundry. During the entire school year of nine months, my tuition ($135), board, lodging, railway fare, with all incidentals, amounted to less than $250. Textbooks are not included. I was a callow youth, self-conscious, timid in making acquaintances, always fearful of not being wanted. I kept much to myself and thus missed the pleasure and benefits that come from close companionship. Most of my classmates were worthy of being companions or even intimate friends. I liked many of the boys and think they liked me, but it rarely went any further. I occasionally played a game of chess with them or got into a scrub game of football on the campus. As a member of one of the seminary literary societies, I took part in their exercises—speaking a piece or singing in a male quartette. To the delight of my landlady and her husband, I sang in the choir of the Methodist church, to which they belonged.

Most of my time was spent in the small room that served as a study in the private home where I roomed and boarded. Sitting on a hard kitchen chair, with my feet on the wood box, I pegged away at my library of ten textbooks within easy reach. My

nineteen-year-old farmer roommate, a fine fellow, though—more through my fault than his—no real companion, on his side of the plain wooden table worked at spelling, geography, arithmetic, and grammar. It was all dreary and monotonous, but I accepted it without complaint or question; it was in the day's work, and I did not know what I was missing.

At the time I did not realize how small was the pattern of the school and the town. Ten years later at a reunion of the graduates of Rock River Seminary, the main building, "Old Sandstone," seemed squatty, the bell-tower a wartlike excrescence, the halls and rooms cheerless and bare. Art Brayton's place, in which was the post office, was but a cramped country drug store, the Brayton home, which had once seemed a mansion, was merely an ordinary, comfortable brick house of one of the better-to-do citizens.

The students preparing for college were taught chiefly by Richard A. Edwards. He was the son of Richard Edwards, a prominent Illinois educator, and was perhaps twenty-five years old and a graduate of Princeton. His deep-set eyes and high forehead reminded one of Daniel Webster, but his features lacked the latter's massiveness. He was cultured and scholarly, sincere and dignified, yet affable; and he had a sense of humor. Under him I studied my Cicero, Vergil, Latin prose composition, Roman history, elementary Greek, and Xenophon. He always insisted on thoroughness. He taught us English by having us read Longfellow and Tennyson in cheap editions. We spent but a short time on Longfellow; most was devoted to Tennyson. Professor Edwards must have been an enthusiastic Tennysonian in those Victorian days of the seventies, when that poet was more popular than later. Our major work was done on *In Memoriam*. This with other of Tennyson's poems was made the basis for a close analysis of the meaning of the text, for a study of syntax as well as of the derivation and spelling of words, for memorizing certain portions, and for reading aloud. No teacher has had a more lasting influence in shaping my later studies and in fashioning my likes and dislikes in literature.

The boys in the Senior class were fine fellows, though there was the traditional black sheep in the small group. Having failed to make good in his hometown school, Harry B. had been sent by his father to Mount Morris. But here, too, he failed. He was a poor student, an idler, with a streak of mischievousness that was close to deviltry.

One incident is still vividly remembered. B. in a fit of anger had cursed a fellow-student. Quick as a flash, the farmer boy challenged him to fight it out. I can see them now as, on their way to a secluded spot of the campus, they hurriedly stripped off coat and vest and with pale cheeks faced each other. Fortunately, Charley Bayne, president of the Senior class, intervened, declaring that there was to be no disgraceful fight In the name of the Seminary he demanded of B. an apology, which was sulkily offered. The two men shook hands. The students applauded.

That evening my roommate and I talked about the fight, and I wondered who would have come out ahead. My roommate expressed surprise: "Why, L. of course. B. is only a city softy. L. has worked on the farm all summer plowing, pitching hay, getting in the corn. He's hard. Here, feel of this," flexing his arm. I felt of his biceps and understood.

Harry B. once got me into a little trouble. In my monthly report card for December was a deportment mark of 94 instead of 100 which I had always received. This lowered my rank in class. I passed a sleepless night wondering what misdemeanor I had committed. I worked myself up to a high pitch of indignation over what seemed to me an injustice. After class, heatedly and with no show of politeness, I demanded of Mr. Edwards an explanation. I got it straight from the shoulder: Before I could begin a speech I was prepared to make he said, "Yes, Mr. Herrick, I marked you down because several times you and Mr. B. have whispered and laughed in class, disturbing me and others. For your good I advise you in the future to sit somewhere else than next to Mr. B. That's all." I walked out a sadder and a wiser man. In the vernacular he had "mopped the floor with me." He taught me a good lesson.

One incident that helped relieve the monotony was a bus trip of about twelve miles to Polo to hear Wendell Phillips. I joined the group only when our principal assured me that the expense of one dollar was not extravagant and that he would so inform Father. We sat in the gallery, where the fifty-cent seats were. When Mr. Phillips closed, I felt we had been cheated; I thought he had cut short his lecture because his audience was small and made up largely of country folk. When I looked at my watch, however, I was astonished to find that it was half-past nine and that he had lectured an hour and a half. I had been oblivious of time. No speaker has ever enthralled me as he did. The apparent ease of his delivery was marvelous. With only occasional gestures, yet always with grace of motion, with no shouting or pounding of the desk, he held his audience spell-bound. He was truly the silver-tongued orator. The story of Daniel O'Connell was told with simplicity, clearness, orderliness; and there was withal a pleasing melody or euphony that brought added charm. I have no doubt that under stress, as when, in Faneuil Hall, he faced a hostile audience and discussed questions of slavery and abolition that were close to his heart, he could be more vehement in his eloquence.

After the lecture we hurried to the hotel, where we were to take the bus. We were fortunate in meeting Mr. Phillips. He was pleased when he learned we had driven such a long distance to hear him. At a stair landing he waved a goodbye and disappeared. We looked at his signature on the hotel registry, I, at least, with a sensation akin to awe or reverence. At that time I knew almost nothing of who Wendell Phillips was or what he had done, but he suddenly became one of my heroes. I now realize that at an impressionable age I was hungry for something more than the mental food that had been offered me, food that had lost its savor because of its never varying sameness. The emotional appeal made by the cultured orator supplied the needed change. The memory of that evening in Polo is still fresh and cherished. Not until many years afterward did I learn that my hero, even in his own New England, was none too popu-

lar; that, with Garrison, he was regarded by many as a dangerous, fanatical abolitionist. Wendell Phillips died in 1884. When high-minded Judge E. R. Hoar of Worcester was asked whether he was going to the funeral, he replied, "No, but I approve of it."

In my time I have heard many speakers who have been classed as orators: Henry Ward Beecher, John B. Gough, James Russell Lowell, Dwight L. Moody, Matthew Arnold, Woodrow Wilson, George E. Vincent, President James B. Angell. The stage presence of every one of these is clearly before me as I write; some little phrase or characteristic gesture of the speaker is still not forgotten: Beecher as he uttered the words "grim-visaged War wiping the bloody sweat from off his brow"; Gough's lecture on "Blunders," his laugh-raising stories, and his remarkable ability as an actor; Moody's impassioned appeal, the tears in his voice as in his eyes; Matthew Arnold's English accent and his pronunciation of the word "traits" like our word "trays"; Lowell's statement that one reason he would not make a direct quotation was because "I have forgotten the quotation and failed to bring the book"; Woodrow Wilson's war speech in the Auditorium in Chicago, that impressed by its seriousness and scholarly style; George Vincent's rapid-fire delivery, his wit, his ability to put over a pat story. The one who most nearly resembled Phillips in his fluency and in the grace and simplicity of his delivery was President Angell.

Commencement exercises were held on the campus. A platform had been erected in front of the women's building. The day was warm and fair. A huge crowd gathered early, the local people turning out en masse. The whole student body was there, as were many alumni and relatives and friends of the graduating class. Farmers' buggies and wagons were in evidence as at a county fair. The women in muslin and ribbons, the men in Sunday suits, blacked boots, and fresh ties, made a gay scene. The Dunkard garb—simple, yet becoming, dresses and sunbonnets for the women and broad-brimmed hats, dark, buttonless coats for the men—was a striking feature.

Each member of the class delivered a short "oration." Mine was on "The Monarchy of England": "The England of today and the England of yesterday! Consider her achievements! etc." Based on scholarship standing, it was my especial honor to deliver the Latin Salutatory Address. I had had a tough struggle over it, I had written it in English and then translated it into Latin, finally transmitting it to Professor Edwards for revision. It began: "The last year of our course is ended." My Latin read, *Ultimus annus nostri curriculi est finitus.* Amended by Mr. Edwards it read, *Ultimus curriculi annus nobis finitus est.* This surely had more of the Ciceronian flavor than mine. As today I look over the manuscript, I note that the red-ink revision is as much in evidence as the original black-ink text.

The year was over. In retrospect, it was an important year of growth toward physical and mental maturity.

In September, 1878, I matriculated as a Freshman in the literary department of the University of Michigan at Ann Arbor. President James B. Angell registered students himself. As he wrote my name in a book that looked like a journal or ledger such as a merchant might use, he said, smiling, "Herrick, James B., I ought to remember that name easily." His memory was phenomenal. We met often during my student days, and many times after my graduation. He never forgot that our given names were the same: "James B."

I was still a callow youth. My clothes were ready-made. I was lacking in polish and was awkwardly self-conscious with older people and with other students who were better dressed or endowed with more of the social graces. I mixed little with others. There was, I can see it now, a subconscious longing for companionship. One night in October I was awakened by the singing of some college boys who walked by the private house where I roomed and boarded; there were no dormitories at that time. As the strains of "Hark, I hear a voice way up on the mountain top," and " 'Twas Friday morn when we set sail" came floating with the moonlight through the open window, it seemed

to me, half-awake as I was, that I had never heard such beautiful harmony. As the sounds died away in the distance, which lends enchantment to the ear as to the eye, there came to me a feeling like Heine's *Sehnen und Verlangen*, a wish that I were one of those boys returning at midnight from the fraternity meeting, that I could call them, or some group like them, companions, friends, brothers.

This feeling of loneliness was with me during the entire Freshman year. Then a change took place, caused largely, I believe, by a new suit of clothes. Verily, clothes make the man. During the summer vacation in 1879, I had a tailor in Chicago make me a suit. The cloth was attractive; the suit fitted. I had a skullcap made of the same material. The whole outfit was stylish and natty, very different from the ready-made clothes I had been wearing. The effect on me was remarkable: I felt more like one of the fellows; had my hair cut oftener, began to smoke Virginia short cut. I rolled the cigarettes myself and was proud to note the appearance on my forefingers of a dark yellowish-brown stain. In my room I smoked a clay pipe and was pleased to see the bowl becoming a rich mahogany brown. In a mild way I was getting to be something of a sport. Then, to my astonishment, almost simultaneously two fraternities "bid" me. I accepted Psi Upsilon.

Before long it dawned on me that I was not so wicked as I had supposed. Some of my classmates twittingly said I was "goody-goody." I didn't drink, swore rarely and then very mildly; I didn't play poker or use a pony in Latin or Greek; I still believed in studying hard, grinding. At the end of the first semester of my Sophomore year I gave up smoking when I learned that I had been identified as "that light-complexioned fellow who, as he leaves class always rolls a cigarette, and who never fails to take a last puff at one before he enters the classroom." This was too much for my pride. I smoked no more for over ten years.

At that time there was still some hazing in Ann Arbor, most of which was of an exaggerated roughhousing kind in connec-

tion with initiations into Greek-letter fraternities. It was merely prankish, the clownish exuberance of boys who imagined it was smart and funny, like the country boys' rowdyish horning or "shivareeing" the newly wedded couple. Two incidents, however, came close to being serious.

In the fall of 1878 a riot was brought on by the "medics," who were aroused by the suicide of one of their number who had become entangled in some affair in a house of prostitution. There were many revolver and rifle shots, a reading of the riot act by the mayor, a few arrests. Almost miraculously no lives were lost.

The other incident was an attempt one evening by some Sophomores to capture my roommate, who, they thought, was a little too self-important, and give him a ducking in the "cat-hole," which was a boggy pond where superfluous kittens were wont to be drowned and in which obnoxious students were occasionally given a cold and none too cleansing bath. My roommate, sensing the intent of the group that was lying in wait for him, borrowed a revolver from a friend across the street and then, by a flank movement, made a rush for the front door and rang the bell frantically. Hearing the bell and the shout "stand back or I'll shoot," I ran downstairs and opened the door just as a bold Sophomore was walking up the steps, recklessly facing a cocked and loaded revolver. It was a lucky escape from what might have been a tragedy.

The elective system for which Charles W. Eliot has been praised and blamed was in vogue at Ann Arbor in 1878. The fault with the course at Michigan was that the requirements for the first two years were laid down too arbitrarily. There was no room for adaptation to the needs of the individual. In my own case, for example, the required year of calculus was, from the standpoint of utility, useless and, from the standpoint of culture, ridiculous. As a means of training in habits of thinking and reasoning, it was for me absolutely without result; my mind, either by nature or because of immaturity, was incapable of responding to the abstract reasoning involved. Professor Cocker's

old-fashioned lectures on out-dated psychology fell on ears that heard but did not understand. Only by cramming and by committing to memory as much as I could of Cocker's paper-covered textbook was I able—much to my own astonishment—to pass the examination. The custom of "majoring and minoring" that has been wisely adopted has helped remove some of the objections to the too free or the too narrow elective system. In some colleges the appointment of preceptors and student advisers has also been helpful.

It is a truism that the personality of a qualified inspiring teacher is often worth more than the textbook or even the subject. Incompetent teachers, misfits, instructors who were temporarily filling positions in an emergency, fossilized old-timers, almost wrecked some of my courses that otherwise would have been worth while. It was my ill luck to miss studying German under the scholarly Calvin Thomas. Instead I had a Frenchman, who, with poor success, tried to teach German to Americans. Another failure was in physics, which was a required course. The teacher was incompetent and uninspiring. The contrast between him and Professor Langley, who handled the work in general chemistry, was striking. The latter, unassuming, dignified, with a quiet sense of humor, was master of his subject. His lectures were clear and systematic. He used no notes. His experiments were simple, never failed, and were employed only to illustrate a point, never for a thrill. It was evident that what was presented was chosen from a large reservoir of knowledge. He taught and he inspired. Strangely, three of the clearest lecturers and teachers I have ever known have been teachers of chemistry—J. W. Langley at Michigan, Walter S. Haines at Rush Medical College, Julius Stieglitz at the University of Chicago.

Among my teachers whom I would class as stimulating was Charles Mills Gayley, known as the author of Michigan's song, "The Yellow and Blue," who became famous, when called to California, for his work in English, especially the old English dramatists. He was in love with his subject, which

at that time was Catullus, Tibullus, and Propertius, and made us see the beauties of these Latin poets. We were encouraged to hand in free translations; some of us burst into verse, which was read to the class. Gayley himself tried his hand. It was a splendid course, and its memory is fresh today. He was what might be called a "provocative" teacher—using the term in a good sense.

Another inspiring teacher was Moses Coit Tyler, head of the department of English, who revealed to me many of the rich treasures of English literature and made me such an ardent admirer of Chaucer that since I left Ann Arbor no year has passed without my reading some of the poet's writings. Professors E. L. Walter, Isaac N. Demmon, and Henry A. Frieze should be added to this list of inspiring teachers. There were others in the university who were of this type, but I was never under their instruction: men like Alexander Winchell in geology, James Craig Watson in astronomy, George S. Morris in philosophy.

As I look back, the four years seem pleasant and profitable. There was a growth toward mental maturity, a broader outlook. The meaning of culture had not been fully grasped, but much of culture had been acquired by absorption. There was an appreciation of the value of books other than textbooks, and the library had taken on a new meaning. There had developed an interest in the records of the past, a healthful skepticism about some features of the present, a curiosity as to certain problems of the future, with an urge to investigate them. Yes, there is a debt to my Alma Mater that is here thankfully acknowledged.

Since 1882 the University of Michigan, like other large colleges, has undergone great changes—changes in physical plant, number of students, curriculum, educational objectives. This was brought forcibly to my attention when in 1932 I was present at Commencement to receive an honorary degree. The exercises, held on the athletic field, were most impressively carried out with a precision that was almost military in char-

acter. There were thousands in the audience who heard perfectly because of the loud-speakers. The graduates numbered nearly two thousand. The Commencement orator was limited to twenty minutes and had been given a hint that a timely topic must be chosen. One could but comment on the contrast with the programs of half a century before.

In 1882 the Commencement orator was Rev. J. M. Gregory, who was, I believe, a former president of the University of Illinois. On a swelteringly hot day in June the audience of three thousand that packed University Hall to the limit had to listen for one long hour to a dreary, prosaic address on "The Relation of the University to the State" The address—really an essay—was of no conceivable interest to the graduating class or to their families and friends. Something brief, snappy, directed to the needs of the young men and women just starting out in life might have gone over. This fell flat.

We had a class reunion in 1932. There was a goodly attendance of those who were left of the group of seventy-five who, fifty years before, had received their degrees from the literary department. We had a good time or tried to make out that we did, though it was saddening to think of those who had left us; it was depressing to see the changes that the years had brought, changes in some instances so marked that one failed to recognize an intimate friend of long ago. As we posed on Junie Beal's lawn, the photographer asked half a dozen to sit down in front on the grass while the rest were grouped standing in the rear. Six old men awkwardly and slowly stooped, with creaking joints and signs of pain. One of them said, "Well, I'm down, but how in God's name can I ever get up?"

We were proud of the record made by the class of '82; a little boastful of the fact that an unusually large percentage was named or starred in *Who's Who*. There was Will Clements, who generously gave time and money to plan for and collect the unique and costly library that is housed in the beautiful building that bears his name; Douglas Houghton Campbell, famed as a botanist; Andrew C. McLaughlin, well known for

his scholarly work in American history. We had furnished four regents to the university. And on our list were the names of prominent lawyers and judges, physicians, educators in public and private schools and in universities, successful businessmen, bankers, chemists, members of Congress. One of the university's presidents said to me one day, "Yes, 1882 was a great class; it has a right to be proud of its record."

CHAPTER III

Teaching in High School

And gladly teche.
CHAUCER

IT IS difficult to determine just when and why I decided to be a physician. As a child I was interested in animals and plants; I collected birds' eggs and cocoons; and from the woods or prairie I brought home skeletons of birds or other small animals. When one of my pet rabbits died, I made what might be called a "post-mortem" examination and concluded that death was due to the claws and teeth of the cat. I interred the remains with elaborate ceremony and erected a tombstone with suitable epitaph. Yet there was nothing unusual about this, nothing that presaged a medical career; many other boys who were interested in nature were doing the same things. There was no early indication that I was born to be a doctor. Yet my election of studies for the Junior year in college shows that at that time medicine was definitely in my mind: extensive laboratory courses in qualitative analysis and a small recitation course in organic chemistry. In my Senior year I took courses that counted as credit toward the A.B. degree as well as toward the degree in medicine: a laboratory course in physiological chemistry under Dr. Victor C. Vaughan and a short course in histology and microscopy under Dr. and Mrs. Charles Stowell. Further evidence that at the time of graduation I had determined to make medicine my lifework is given by the fact that I

refused a tempting business offer from a prominent insurance firm in Chicago and resisted an urgent appeal made by a clergyman to go into foreign missionary work.

After my graduation from Ann Arbor, Father thought it would be wise for me to teach school for a year or two before beginning the study of medicine. The experience would be a good thing, and the money earned would ease the strain on the family exchequer. So letters were sent out to school boards, applying for a position as teacher in a high school. Late in summer a letter came from my old Mount Morris principal, who was now superintendent of schools in Peoria, Illinois. It read "I offer you a position as teacher of English, etc. in the Peoria High School at a salary of $600 a year. Please wire your acceptance at once." I telegraphed, "Will come for seven hundred dollars." Within two hours the reply came: "You are appointed at $650." With this laconic correspondence began a pleasant and eventful year of teaching in Peoria

My work, instead of being in English, as I had supposed it would be, was elementary Latin and Greek, with one class in history. I was, in reality, the assistant of William H. Wait, who had charge of Greek, Latin, and German. He and I not only were associated in school work but were in daily contact in the private home where we roomed and boarded. We became most intimately acquainted. He exercised a stronger influence over me than I realized at the time. Wait was peculiar, and to strangers he seemed cold and forbidding. If, however, one could pierce the shell of dignified austerity in which he was usually encased, one found a highly sensitive individual who longed for friendship but did not know how to secure it.

He had two pleasures in life, one of which was music. He had a fine, well-trained bass voice and sang in a church choir. His major pleasure, however—it cannot be called a relaxation—was persistent study, especially of Latin and Greek, which he pursued relentlessly. He was a graduate of Northwestern University with an M.A. degree and had an exceptionally fine record in languages. His memory was phenomenal. When

I was reading extra Latin—it might be Catullus, Pliny, Tacitus —I would appeal to Wait instead of consulting the lexicon or grammar. Almost invariably he would give me a prompt and correct answer, without knowing the context or even the author, telling me from what stem the word was derived, its gender, and its peculiarities.

Though I was attracted by his marvelous scholastic ability, it dawned on me later that he had serious defects as a teacher. He was lacking in warmth and had little imagination. Though he would not fail on the grammatical construction of Horace, the beauties of the poet might escape him. Later he taught at the University of Michigan, and his record there was the same: he was a grind, a martinet; he drove his pupils but did not stimulate them; he did nothing in the way of research; he failed to secure promotion. Because of senility in his advancing years, he lost the solace even of his books. After the death of his charming wife, whom he had married late in life, he existed as a lonely solitary. When I last saw him, I was not sure that he knew me.

Teaching in Peoria was a tough job. The pupils were a strange medley that reflected the character of the homes from which they came. The city was a railroad and shipping center, a lively grain market, with many big distilleries. There were representatives of all shades of religious belief from the Protestant fundamentalist to the skeptic lawyer, Robert G. Ingersoll. Broadminded Catholic Bishop Spaulding was one of Peoria's most prominent and highly respected citizens. He associated with learned rabbis and canny Jewish merchants, who were much in evidence.

In the high school were refined young ladies from families of culture and coarse-fibered girls of lower social rank. The rich and poor sat side by side. Timid, well-brought-up lads whose parents were unable to send them to private schools were studiously trying to prepare for college, while other boys, roughnecks, aimed to bluff their way to passing marks, perhaps threatening through political pull to get even with the teacher who insisted on thorough work, for the city was a hotbed of

politics, which had infiltrated the schools. Yet I enjoyed teaching. There was a fascination in trying to impart facts to the young, to train them to think, to stir up their enthusiasm.

My decision to make medicine my lifework was badly shaken by my year in Peoria. I enjoyed the many hours of leisure, when I could read and study not only the Latin authors but the English as well. My old fondness for Tennyson, Chaucer, Thackeray, and Shakespeare, that I had cultivated at Mount Morris and Ann Arbor, came back to me. Besides, I had become enamored of teaching.

Before my year was over I asked myself whether it would be foolish to try to qualify as a teacher of English. I wrote Professor Demmon, of Ann Arbor, and he approved my plan for advanced study and advised either Harvard or Johns Hopkins in preference to the University of Michigan. I still have the replies of Francis J. Child, of Harvard, and Basil L. Gildersleeve, of Johns Hopkins, saying they would be glad to accept me for such work and hoped to hear from me again.

Then a surprise came in the form of a letter from my old Oak Park principal, B. L. Dodge. He offered me a much larger salary to take charge of Latin and Greek in the Oak Park High School. As the Oak Park offer meant not alone an increase in salary but a lessened expense, since I should board at home, I accepted, after consultation with the Peoria superintendent of schools.

I taught in Oak Park High School from September, 1883, to June, 1886. During the last year, 1885–86, I did part-time work in medicine at Rush College in Chicago.

Since 1877, when I had been graduated in its first class, the high school had increased in size and improved in quality. The course was up to college-entrance grade; Latin, German, and science were well taught by good teachers. My assignment was to teach Greek, advanced Latin, and English literature. In addition, there was usually a class in science—botany, chemistry, or physiology.

The pupils came from a better type of home than those in Peoria. There was less rude behavior, no rowdyism, and more evidence of culture and refinement. The effects of political squabbles that in Peoria had been noticeable in the schools, upsetting the morale of teachers and pupils, were almost completely absent in Oak Park. The regime of Mr. Dodge, however, was beginning to be subjected to comment which was not altogether favorable. No fault could be found with him as an organizer and business manager. The buildings, the grounds, and the equipment were kept in good condition. He handled the obstreperous or bad student in a quiet, unostentatious way through private conferences with the child or the parents. He kept close to the pupils, by whom he was beloved, as his nickname, "The Brother," testifies. His weak spot, so his critics asserted, was a lack of scholastic background; he had had no college education. This unfriendly attitude on the part of some citizens resulted, long afterward, in Mr. Dodge's resignation.

Mr. Dodge was a wise administrator who was not constantly annoying his teachers by meddlesome interference with their work. Plans for my little department were left almost entirely to me. Orders for change were never given; suggestions might be offered, but always with tact. So, largely left to my own resources, I gained self-confidence and acquired a certain ability to run things on my own responsibility. This was helpful later in more ways than one.

I enjoyed my work. Chemistry with experiments was great fun. The boys liked to help in getting the apparatus ready and were glad to stay after school for this purpose. And so with physiology.

One incident came near stirring up a good deal of excitement in the village. It must have been in 1886, when I was working Saturdays and evenings in the medical school. I had shown the pupils a human skeleton and a human heart in a jar of alcohol. All this was new to the school, and there were many "Ohs" and "Ahs" of surprise and interest as the boys handled the skull, or expressions of half-squeamish timidity as the girls saw me

take the heart out of the jar and point out its cavities and its valves. On another occasion I demonstrated to the group some of the anatomic structures and physiologic phenomena in a pithed frog. Encouraged by my success in arousing interest, I went a step further. With the help of one of the boys I etherized a dog, in the basement. We carried the animal upstairs to the classroom. With the aid of artificial respiration and while the animal was kept under deep anesthesia, I exposed the viscera *in situ*, by dissection. Rembrandt's painting of the "Lesson in Anatomy" shows no keener interest on the faces of the figures grouped about Dr. Tulp than was manifested by that class of pupils as they saw the liver, the spleen, and the kidneys and were witnesses to the peristaltic action of the bowel, the beat of the heart, the expansion of the lung. A few days later there came to Mr. Dodge a letter from Mrs. R., head of the local chapter of the Society for the Prevention of Cruelty to Animals. She protested and warned. Vivisection, at least before young pupils, was taboo. If necessary, legal steps would be taken to prevent a repetition of any such scandalous performance as that which had taken place in my class. The local paper had a note about it. Mr. Dodge was amused but said it might be wise for me to curb my enthusiasm as a youthful student of medicine. There were no further demonstrations of this kind before my class.

This period was a critical one for me. It was then that a final decision was reached that medicine was to be my vocation and that I gave up all thought of teaching English as a life-career. I can truthfully say that I was not influenced by reading George Bernard Shaw's "He who can, does; he who can't, teaches." This typical wisecrack, half truth and half wit, was not uttered, or at least not known to me, until later.

It had become clear to me that unless I showed qualifications as a writer I could never be rated a superior teacher of English. And how could I live on the salaries that were paid? Even if successful in getting into a school where a fair salary was paid, would I be able to travel, attend association meetings, have an opportunity to relax, to develop and really enjoy life?

I spoke to Mr. Dodge about my dilemma. I expected him to urge me to keep on as a teacher. To my surprise, he emphatically said it would be foolish for me to continue teaching. "Look at me," he exclaimed, "I have as good a position as can be found in the public schools of Illinois. I can never get any higher. I hold an appointive office and may be turned out any day. Even if you, who have a better educational background than I, succeed in getting into a college faculty, you'll be poorly paid, may have to work under someone else, may lose your job. Go into medicine; be your own master; don't work for hire for somebody else. Herrick, you'll succeed." Mr. Dodge's advice, so earnestly, almost vehemently, given, had a marked influence in strengthening my decision to make medicine my lifework, a decision I have never regretted.

It should be added that at this period I had become engaged to Zellah P. Davies of Oak Park. The prospect of a happy, successful married life seemed to us greater if I became a physician rather than a teacher. Never during more than sixty years, have we questioned the wisdom of our decision.

CHAPTER IV

Medical Student

Teaching in those days was chiefly by the didactic lecture and the large clinic, a method that was windy and wordy, under which the students heard much, saw little, and did nothing.

WILLIAM J. MAYO

HAVING decided for medicine, I thought it wise to get advice from our family doctor, John W. Tope. In 1885 he was about forty years old, the leading physician in Oak Park, with a rapidly growing practice in the village and surrounding territory. He had been graduated from Rush in 1870 and had served with distinction as an intern in Cook County Hospital. He was an unusually competent, all-round doctor, a tireless worker, forthright in speech, brusque in manner, with little sympathy for fussy patients. Ladies were known to say, "I won't go to him for slight troubles, but if I'm really sick I want Dr. Tope." He cared little for society, dress, or frills of any kind. He was devoted to the Knights of Pythias and the G.A.R.—at about sixteen he had enlisted in the Union Army. He was a standpat Republican in politics. In religion—well, "his studie was but litel on the Bible."

So I went to him for his opinion and got it, straight from the shoulder.

"I suppose, Dr. Tope, I ought to go to N. S. Davis' school; he is, I believe, the leading surgeon in Chicago."

Dr. Tope nearly hit the ceiling at my ignorance. "N. S. Davis the leading surgeon! He isn't a surgeon at all. He's not even a leading physician. Now, see here, you go to Rush College."

"Where is that?" I asked innocently.

"Why, on the west side near the County Hospital."

"County Hospital? I never heard of it."

"Never heard of the County!" Dr. Tope proceeded to enlighten me in no uncertain terms.

I matriculated at Rush on June 13, 1885, and believe I made a wise choice.

At a later date Dr. Tope gave me further advice for which I still feel a debt of gratitude. He told me to stop wasting time as a student trying to remember prescriptions and doses of drugs. "Devote your time to two things: Learn how to tell what's the matter with the patient; to this end study anatomy, physiology, attend clinics and post-mortems. Above all, prepare for the Cook County Hospital examination for interns. You'll learn there all you need to know about drugs and prescriptions."

During the remainder of 1885 and up to June, 1886, I continued to teach in the Oak Park High School, but during vacations and Saturdays I attended clinics and lectures at Rush. By working evenings, I finished the first course in dissection in this period. In this way a good deal was picked up in this part-time first year. I read studiously in books that Dr. Tope lent or recommended and talked over cases with him.

In 1885 Rush College, like so many other medical schools, was virtually a proprietary institution that granted the degree of doctor of medicine after two short years of twenty weeks each. Opportunity for additional work was offered by an optional spring course of ten weeks. This course was manned by excellent teachers, usually the younger men of the faculty. Students were urged to register for it, and many did so.

For admission to Rush, the applicant was supposed to be a graduate of a high school and to have served a sort of apprenticeship of one year under a physician, who, as preceptor, cer-

tified to this fact as well as to the applicant's character. Though the requirements were not always rigidly enforced, the college could claim, as it did, that three years were required for graduation, with opportunity for nine months' work in the year.

The students were men of all types. The refined, well-educated, neatly dressed, well-to-do student, twenty-one to twenty-five years of age, who had high ideals concerning his chosen career, might sit next to a poorly dressed, thirty-year-old man who, likewise with high ideals, was working his way through college. Or his neighbor might be a rougher specimen who, after twenty or thirty years as a teacher, druggist, traveling salesman, or western farmer, had given up his former occupation because he believed he could make more money as a doctor. In my class of 1888 there were only seven men out of the one hundred and thirty-five who could show diplomas from colleges of literature, science, and arts.

In seeking for the reasons why so many excellent physicians were turned out by Rush, with its short, imperfectly graded courses and its poverty in laboratory and clinical facilities, one must realize that in the ultimate analysis success depends largely on a man's inherited qualities, his ability and willingness to work hard, and, to a degree, on chance—health, environment, financial investments, luck as to marriage. Many men who went to Rush were bound to succeed, no matter what occupation or profession they followed; they were born leaders. Then some of the older men who seemed crude and raw, already had an advantage over the others because of their experience as druggists or cowboys or commercial "drummers." The doctor, as has been aptly said, sees people not at their best, as does the minister, nor at their worst, as does the lawyer; the doctor sees them as they are. These older men started practice knowing people as they really were; they knew how to handle them.

But, granting all this, one of the main reasons why there was such a rich output of successful and even distinguished men from Rush is to be found in the character of its faculty. The strength of the college lay not in its buildings or laboratories or

in its courses of study. For years all these were most primitive. Its strength was in its men, who even in the earliest days were of giant stature.

The founder of Rush, Daniel Brainard, came to Chicago in 1836, a poor young doctor, twenty-four years old. He quickly became not only the leading medical man in the city but one of its most prominent citizens. At one time he was a candidate for mayor. He was successful in business ventures, and at his death in 1866 he left an estate estimated to be worth half-a-million dollars, an unusually large sum for those days. He had vision in medical matters as well. One year after his arrival in Chicago, through his initiative a charter for Rush college was obtained from the legislature. Before students were admitted in 1843, Brainard, in 1839, went to Paris, then the world's medical center, where he spent some two years in study. Again, in 1852, he revisited Europe for purposes of observation, study, and research.

In 1866 he returned from still another trip. At this time cholera was raging in Chicago. Almost immediately after a lecture to the students in which he had discussed at length this disease, which he very much dreaded, he was stricken with a virulent form of the plague, and within twenty-four hours was dead. Dr. Ephraim Ingals, a faculty colleague, attended him during his brief illness.

In looking over some bound volumes of old college catalogues of the time, I found, as an insert, a letter in the handwriting of Ephraim Ingals. The letter, dated Chicago, January 29, 1893, is concerned with a bust of Dr. Brainard, modeled by the sculptor Leonard Volk, from a death mask he had made. Leonard Volk, it may be recalled, had to do with casts of Lincoln's face and hands. Dr. Ingals, who was one of the prominent practitioners of Chicago, was evidently a careful observer, for he noted as a matter of scientific interest that when Dr. Brainard's body was removed from the vault, where it had temporarily rested for several weeks, and was taken to Graceland Cemetery for interment, almost no change was to be seen in the fea-

tures because "death had been caused by a disease that drained the system of its fluids." He adds: "I was a witness of his death and burial. . . . Edwin Powel [*sic*] M.D., a nephew of Dr. Brainard caused the bust to be made." This bust is now in the library of Rush Medical College.

That Daniel Brainard was a man of more than ordinary ability is also shown by the many testimonials offered by the alumni of Rush. They speak of his commanding presence, his dignity; of his learning and the clarity of his orderly and logical presentation of topics in his lectures; of his keen powers of diagnosis and his skill and judgment as an operator. No wonder, then, that he became the surgical leader of the Northwest, the peer of surgeons in the eastern states.

Brainard's successors, J. V. Z. Blaney, J. W. Freer, J. Adams Allen, were worthy to receive the mantle of their renowned predecessor. Others of the faculty were of the same type. One may mention Henry M. Lyman, who was a graduate of Williams, and Walter S. Haines in chemistry, who, after graduating from Harvard, had pursued graduate study in Paris. E. L. Holmes, president from 1890 to 1898, had degrees in arts and medicine from Harvard and had worked in ophthalmology in Berlin and Vienna, in which latter city he had been an intimate friend of the great surgeon Billroth. De Laskie Miller in obstetrics and James Nevins Hyde in dermatology, experts in their specialties, were men of culture, whose lectures were models of good English. Norman Bridge, though not a graduate in arts, was scholarly. If others like Byford, Gunn, Parkes, Ross, and Etheridge were less scholarly, they were earnest, forceful, and always understandable. They had been trained largely in the school of experience, were possessed of common sense, knew the needs of the undergraduate, and conscientiously tried to impart the knowledge that met those needs. It was truly a great faculty. At the time that I matriculated, 1885, it was, I believe, superior to any other in the West.

One marvels all the more at the efficiency of the teaching which produced so many worthy alumni, if one considers that at

that time there was only a very imperfect grading of work. Teaching was chiefly by didactic lectures, which were repetitional, and by the large amphitheater clinic. The student, on entrance, naturally attended lectures on elementary subjects like anatomy, materia medica, and physiology. He could and usually did attend lectures and clinics on more advanced topics like surgery, obstetrics, and ophthalmology. If he heard Dr. Gunn's lectures on surgery one year, next year he heard the same lectures, listening more intelligently and getting more out of them than before. The student was passed or rejected—usually passed—almost solely on his examination paper. Many incompetents got through because of intensive cramming or by cribbing and cheating, which were common occurrences.

As an extreme illustration of the unfortunate results of this illogical mixture of elementary and advanced subjects that was so unsound from a pedagogic point of view, I may cite an incident that occurred in February, 1887, while I was a student. Dr. Henry M. Lyman held the two chairs of physiology and neurology. He lectured to us on physiology, including histology, up to Christmas; during the rest of the school year, that is, until late in February, he lectured on diseases of the nervous system. His examination included both these topics, the one clearly elementary, the other much more advanced. The report had reached him that students called his course a "soft snap" because everybody passed. Stung by this criticism and apparently with the object of getting even with his critics, he offered at his examination the following questions:

1. Describe the cells and tissues of the body
2. Acute anterior poliomyelitis.

These he wrote on the blackboard, in large letters, with meticulous care as to legibility and with a deliberation that was probably meant to be torturing to the two hundred students, who preserved the traditional "you could have heard a pin drop" silence until the last word had been written, the last *t* crossed and *i* dotted. Then there was a storm of inquiries that revealed

bewilderment or poorly concealed indignation. Did he mean all cells and tissues, including their functions? And what was poliomyelitis? Dr. Lyman icily and sarcastically replied that the students surely could understand plain English; they must decide for themselves what was meant. Most of the men, who had crammed for the examination by committing to memory the circulation of the blood, or who had a pony in the pocket giving the chemical composition of the gastric juice or perhaps a list of the symptoms of locomotor ataxia—they knew these had been oft repeated questions in previous years—were simply flabbergasted. Out of some two hundred only four received a passing grade. If I had not accidently heard some one whisper "infantile paralysis," I might not have been one of the fortunate four.

In mitigation of the faults that may be charged against this anomalous system, it must not be forgotten that the amount of knowledge that was then regarded as proper for the ears of the medical student was extremely small as compared with that of today. The mass of medical facts that has accumulated since that time is so huge that all medical schools have perforce lengthened the period of undergraduate study, have graded the work, and have made laboratory and ward work compulsory. Change was inevitable. It was not long before Rush radically altered its confused and imperfect curriculum.

One other feature of teaching at this time is worth comment. It is true that what was fed to the student by the didactic lecture were chiefly facts, true that he had no practical ward work and that his laboratory courses were minimal. But he was taught proper methods of thinking by most of his teachers. This was especially true of the clinics. Here the student, by concrete example, had lessons in how to question the patient, how to make a physical examination, and, finally, how, by considering critically the data thus obtained, by logical reasoning to reach a diagnosis and decide upon the proper treatment. These lessons in the technic of proper thinking may at times have been given unconsciously by the teacher and were often received unknow-

ingly by the student, but they bore fruit in later years as the graduate met similar problems in practice.

For many years, even centuries, medical students have had the reputation of being less refined and of coarser fiber than other students. The explanation may be that, from the nature of their studies, the medical students, men well out of their teens, are inclined to take a more materialistic view of life than their brethren who study law or theology or than the younger men who make up the generally small audiences in our literary schools. In these other colleges sporadic cases of hazing break out. In the larger medical groups the same tendency, primordial in the human animal, may break out and spread as does an epidemic of contagious disease.

At Rush, as at other medical schools, rowdyism and roughhouse often broke loose. During the intermission between lectures the tired student rose from the seat he had occupied for two hours or more, yawned, stretched himself, lit his pipe, exchanged gibes with his neighbor across the aisle, or suddenly yelled at some newcomer who was entering by the short cut of the arena—the "bull pen"—or perhaps knocked the hat off the man who was walking down the steep aisle to get a seat closer to the front. He whistled and sang. The singing was contagious. We all joined in, and the music of three hundred to four hundred male voices was inspiring as we sang "There's a Hole in the Bottom of the Sea," "Clementine," "Old Kentucky Home," or "America."

"Passing up" was common. My excuse for describing it is that the smaller classes of today, with their higher cultural requirements, make this custom so much a matter of ancient history that to some readers it may be unknown. A man in the front row might find himself suddenly grasped in the armpits by stout hands from the seats directly behind, i.e., above him. If he were wise, he didn't resist but let himself go sailing rapidly from one tier of seats to another, four huskies always having him in charge, two at his shoulders, two at his feet. He reached

the top or fifteenth row with hair mussed and clothes a little ruffled. Perhaps his pencils, cigars, or a few pennies had dropped from his pocket, but he was unhurt. Then he might be passed back to his old seat. Generally he walked good-naturedly down the center aisle, each of his steps being accompanied by the thump, thump, of some three hundred feet that kept time with him. As he sat down, there was a fortissimo plunk as each of the three hundred students brought down both feet to the floor. It always seemed funny to the crowd; there was a rousing, good-natured cheer as a finale.

The real excitement of passing up came when some well-muscled victim was rebellious and resisted. There were yells and howls; buttons and collars flew off, clothes were ripped, seats smashed. Unless the professor happened to enter during the tussle, the man invariably landed at the top row, winded, bruised, and scratched. While there might be torn clothes and bloody noses among the torturers as well as the victim, vicious blows were not intentionally given on either side. These were debarred by the rules of the game. It was always regarded as a game or sport. An unusually obstreperous man was sometimes given more than one ride of this kind.

Many roughhouse incidents I remember vividly. Dr. Parkes was operating. Bob Locke, a bright, good-natured, lazy student, was acting as a clinical assistant in charge of the instruments. Schubert, a student who was sitting in the "bull-pen," whispered to Locke to stand aside so that he could see better. Bob turned and wickedly clamped Schubert's mustache in a pair of artery forceps and gave a sharp pull that must have hurt. Dr. Parkes did not see it; Schubert looked angered but said nothing. As soon as the clinic was over, however, and before Locke was aware of what was coming, Schubert hit him a blow in the face that knocked him down. Dr. Parkes, hearing the noise, turned. He saw Bob picking himself up from the floor with blood streaming from his nose. He asked angrily what was the matter. Bob was a sport and said, "I got what was coming to me, Professor," and explained the incident. Parkes, sponging off Bob's

face, replied: "Well, you damned little fool, come into the hospital and I'll fix your broken nose for you."

On another occasion some boys on the "perch" opened the windows to let in fresh air. From the ledges or window-sills they gathered soft snow, made snowballs, and began to fire them promiscuously among the students. Soon snowballs, wads of newspaper, rubbers and overshoes, apples and hard rolls from opened lunch boxes, even the boxes themselves, were flying everywhere. Someone let fly with a baseball; this was decidedly dangerous at short range. The floor of the arena, covered with melting snow, rubbers, hats, etc., looked like a pigsty. In the midst of the pandemonium Professor Lyman walked in, prepared to begin his lecture. He stopped short, turned red, glanced at the blackboard dripping with water, at the filthy mess on the floor, and at the benches filled with excited students, and then, looking unspeakable disgust, turned on his heel and walked out. There was no lecture from him that day.

There is no more understanding comment on the rowdyish behavior of medical students than that of Dr. John Brown in *Rab and His Friends*. Even though it may be familiar to readers, it is well worth repeating.

At a clinic in Edinburgh, a woman from the country was brought in by her husband to consult the great Scotch surgeon Syme. The odd dress and manners and the rustic dialect were too much for the students, and there were loud laughter and jeers. But when they saw the hard, cancerous breast, the courage with which the patient submitted to the operation without an anesthetic, the tender devotion of the husband, and the courtesy and kindliness of the surgeon, tears coursed down their cheeks, and, as the brave little woman was wheeled away, the amphitheater rang with applause. Dr. Brown comments: "Don't think the students heartless; they are neither better nor worse than you or I; they get over their professional horrors, and into their proper work; and in them pity as an *emotion* ending in itself or at best in tears and a long drawn breath, lessens —while pity as a *motive*, is quickened, and gains power and pur-

pose. It is well for human nature that it is so." This is a true observation. Emotionally, outwardly, the medical student may seem rough and unfeeling, and the same may be true of the physician. At heart, he is human. In no profession is there more genuine kindliness than in that of medicine.

As I have said, despite the inferior preparation of many of the students, the repetitional courses, and the lack of laboratory and bedside teaching, the majority of the students, who were mature men, were seriously and conscientiously aiming to extract all that was possible from their short period of undergraduate life. They attended lectures faithfully; took notes, which they rewrote; studied textbooks, formed quiz classes among themselves. They really got a great deal out of it all. They were eager for appointment as assistants in clinics, the surgical especially, and even willing, for this privilege, to be derisively called "supes" by their less fortunate colleagues—a corruption of "super," the supernumerary of the theatrical stage. My good luck in doing such service in the dermatological clinic of Dr. Hyde and in the surgical clinic of Dr. Gunn was due in part to the fact that I was a constant attendant at clinics during the long summer vacation when students were scarce. The professor was glad to have aid at such a time.

I insert here a few thumbnail sketches of some of the Rush teachers of my student days, 1885–88.

J. Adams Allen—always affectionately referred to as "Uncle Allen"—was a Vermonter. Born in Middlebury in 1825, he took his degree in arts from the excellent college in that city, and in 1846 his degree in medicine from the medical school at Castleton in the same state. This latter school, long since defunct, was typical of numerous small proprietary medical colleges then scattered throughout the East and, later, the Middle West. After active practice in Michigan and some teaching at Ann Arbor, he came to Rush in 1859 as professor of the principles and practice of medicine. From 1877 to the time of his death in 1899, he was president.

When I first saw him in 1885, he was sixty years of age. With his few remaining locks and luxuriant beard snow white, his portly frame carefully clothed in a long, black, well-fitting Prince Albert coat, and his dignified bearing, he looked the part of the venerable, patriarchal physician of the old school. His lectures were almost exclusively devoted to the principles of medicine. He rarely discussed the symptoms or diagnosis, or detailed the treatment, of any specific disease. We heard much of general causes, of humors and temperaments, of the influence of the weather. In particular, he emphasized the importance of considering three things: the condition of the blood, of the nerve, and of the part. As one thinks of it, this is a rather comprehensive, if brief, statement of many of the factors that underlie disease.

Personally, I learned little from him, though many others long after their graduation expressed the opinion that they had received more help from his lectures in meeting the problems of practice than from any other man on the faculty. To me he seemed to be too much behind the times. He did not believe in bacteriology. Of the stethoscope he said: "He that hath ears to hear let him hear with his ears and not with the stethoscope." He drew a ridiculous picture of a large amphitheater clinic: "Gentlemen," he said, "the learned professor who is wedded to his stethoscope, brings in a patient—any kind will do—asks him a few questions, looks at his tongue, feels his pulse. Then he fits a double-barreled stethoscope into his ears, thus lengthening them out until they resemble those of an animal that shall be nameless, listens a minute, pounds the chest a little, looks wise (this is very important), seems to be in deep thought for a moment and announces: 'This may be bronchitis, pneumonia, pleurisy, or tuberculosis.' Then, after this five- or ten-minute display, he talks for an hour on anything from aurora borealis to hell's gate. And, gentlemen, that's a clinic! Bosh!" Of course we all laughed. There was much truth in what he said. Yet even then I had the feeling that Uncle Allen was too much of a stand-patter, who failed to realize that medicine was in the throes of a new birth. He seemed to lack the constructive ability radical-

ly to alter the pattern of the medical school. He was still clinging to teaching by the didactic lecture and the large clinic, a method that Will Mayo once characterized as "the windy, wordy kind under which students heard much, saw little, and did nothing."

Dr. Allen was an effective speaker, scholarly, rarely uninteresting. His lectures were punctuated with entertaining stories and lively repartee, for he had a keen sense of humor and a quick wit in answering questions that were handed in by students. Not all his anecdotes were of the parlor variety.

A short time before his death on August 15, 1890, from cancer of the bowel, the students surprised him by presenting to him a life-size statuette of a gold hand mounted on a marble pedestal, the hand upright with the thumb and little finger in contact. It represented with great accuracy a favorite gesture of his as on the uplifted fingers he would count off the three points he so often emphasized. The legend on the marble pedestal pleased him:

> We'll remember three things if we practice the art,
> Condition of blood, of the nerve and the part.

His remarks on the occasion of the presentation of the gift are fresh in my memory. As the silk handkerchief covering the cast was withdrawn and the students rose and vigorously applauded, tears came to Uncle Allen's eyes; I was sure he would break down. But his sense of humor and quick wit saved him. The boys took their seats. Somewhat haltingly and with a quaver in his voice, Uncle Allen said: "My dear friends, in my long life I have been more than once surprised, but on such occasions I have never been at a loss for what to say. But, boys, this time"—he hesitated a moment; we listened in dead silence —"this time in the beautiful language of the poet John Milton, '*you've got me.*' " The boys applauded in affectionate admiration. Then Uncle made a nice speech of thanks.

He was a learned and wise medical philosopher of the school that was rapidly passing away.

At the head of our department of surgery was Moses Gunn, then sixty-three, a fine example of the surgeon of the old school, a man of striking appearance, alert, and forceful and simple of speech. He was straightforward in action—he never liked the middle-of-the-road attitude of mind. Blown into the glass of the front door of his house on Calumet Avenue was *Aut pax aut bellum*. In college, hospital, private practice, and in the Civil War he had had much experience with fractures and other emergency surgery; with hernia, bladder stone, and external lesions. In accordance with the custom of preanesthetic days he worked with dexterity and marvelous rapidity. I have seen him perform a complete harelip operation on a child in five minutes with no anesthetic, "thus avoiding shock." He withheld judgment regarding microbes—"little devils" he called them—yet he soaked sutures in carbolic acid solution; for, said Gunn, "I believe since doing this I get better results in wound healing." Had he lived, he would surely have accepted the germ theory of disease and would have tried to practice aseptic surgery. He died on November 4, 1887. He influenced many who became prominent surgeons—such men as Parkes, Murphy, McArthur, Bevan, M. L. Harris, A. J. Ochsner.

Because of the intimate contact with him that I had as one of his assistants in his college clinic, I recall several interesting incidents. Gunn was proverbially prompt at lectures and clinics; he prided himself on being on time to the minute. One day he had not shown up, though it was two minutes beyond the time. As I was waiting for him at the entrance to the arena, I heard him come puffing and storming down the long circular hall that ran under the amphitheater. Without stopping, he hurled at me as though I had demanded an explanation, "Damn the Chicago river bridges, they are no respecters of college teachers." He rushed before the students and offered his apology: "Gentlemen, I'm sorry I'm late. I feel as though there had been lost not two minutes of my time but two minutes' time of each one of you three hundred men. That makes a loss of 600 minutes, or ten hours. It is inexcusable." It was a new point of view.

Gunn was a striking figure—tall, erect, of good carriage. His white hair that formed a long curling fringe around his bald pate always excited the comment of strangers. One day a student sent down a note—this was a privilege granted by all our teachers. Gunn's face flushed a little as he looked at the note, then he read it aloud: "How do you manage to get your hair curled so nicely every day? Who is your barber?" Dr. Gunn said "I'll answer this saucy, not to say impudent, note, though perhaps it doesn't deserve it. There is a little woman with whom I have lived for many years. I owe to her more than I can ever repay. When we were married I had a head of hair of which she was proud. She always cared for it and still cares for what there is left. Every morning that little woman curls my hair and, by the Eternal, she is going to do it just as long as she wishes to. So, that's that." No wonder the boys liked him.

On another occasion he read the riot act to the student body. For the first time in the history of Rush a woman appeared as an assistant in the college clinic, a Dr. Mitchell, who had been appointed as intern in the Presbyterian Hospital. Notes of protest were sent to Gunn, saying such a position should be filled only by a Rush graduate, a man. When at the next clinic the new intern again appeared, the students hissed and hooted. Gunn sent her from the clinic and then, turning to the amphitheater, said: "You have the manners of Halsted Street hoodlums or a lot of Comanche Indians. Dr. Mitchell is the niece of my dear friend, Dr. Post of New York, to whom I am indebted for many favors. She is competent and a lady. I have appointed her as intern. And, gentlemen, she's going to stay. But if there is one more demonstration such as you gave a few minutes ago *you* will go, every one of you. I mean what I say. Make your choice." The boys stayed, and so did Dr. Mitchell.

One day Gunn appeared in the clinic with his eyebrows singed, his beard and hair cut much shorter than usual, his hand bandaged, and a dressing on his face. He said to the students: "There's no fool like an old fool. Learn by my experience and don't do what I did. I was operating for nevus or birthmark on

the face of a beautiful child of about ten years. We used ether as an anesthetic. You have heard me caution against using a Paquelin cautery at white heat, especially when ether is about; only a dull cherry red is allowable. Gentlemen, I've had my lesson; I hope I profit by it. The cautery was just a dull red, but there was an explosion. Thank the Lord there is no worse result to patient or surgeons than singed hair and a few blisters. It might have been a lot worse."

Dr. Gunn died on November 4, 1887, of cancer of the rectum. His successor, Charles T. Parkes, was also a surgeon of the old school, though he was becoming rapidly modernized. A master of anatomic surgical technic, he operated brilliantly, rapidly, and accurately. He recognized his own limitations as to knowledge of bacteriology and microscopic pathology and wisely sought the advice of younger men regarding these subjects. He had learned the value of asepsis as contrasted with antisepsis, largely, I believe, through the coaching of his assistant, Dr. A. J. Ochsner. He had been sharply criticized for operating in the clinic on abdominal cases: "Germs would drop in and cause trouble." In defense I once heard him say: "Gentlemen, I don't know much about these germs, but I am convinced that what does the harm is not something that may float in the air and settle in the open abdomen, even in such an unsanitary place as this amphitheater. It is what is put into the abdomen that makes the trouble. So if I not only wash, but scrub, my hands thoroughly with soap and water and if the instruments and gauze and ligatures are boiled, I am safe."

In the college clinic he performed successfully one of the first cholecystectomies done in the United States. His pioneer research work on gunshot wounds of the small intestine was recognized as an important contribution to experimental surgery.

Parkes died of pneumonia in 1891, at the early age of forty-nine. He had a majestic, magnetic personality and was friendly to young men. Had he lived, he would have been one of America's outstanding surgeons.

De Laskie Miller for many years held the chair of obstetrics at Rush. I heard Dr. Miller's last course of lectures, given in 1887. Even today it seems to me that he was the best didactic lecturer on any subject I have ever heard. In appearance and bearing he was a gentleman. He was master of his subject. He recommended to the class Playfair's book, and in his presentation followed the plan of that author. The views he advanced, however, were those he himself held as the result of reading other writers and of his own extensive practice in midwifery, of which, by the way, he never boasted. His lectures were models of expositional, didactic teaching. He spoke without notes, fluently, with exceptional clarity, and with no display. There were occasional touches of humor or pat anecdotes which were never vulgar. The students listened to him with never a manifestation of the rowdyism that was shown when some of the other professors lectured. Their behavior was an unconscious tribute to the scholar and gentleman whom they so highly respected.

The contrast between De Laskie Miller and his successor, J. Suydam Knox, was marked. Knox was a practical obstetrician and not a bad lecturer. But his lectures seemed like casual rambling talks based on an experience of which he often boasted, rather than on a scholarly presentation by one who, forgetting self, aimed solely to present, in the best manner he could, the subject he had studied and practiced many years.

The important position of secretary of the college faculty was held by James H. Etheridge, who held the chair of materia medica and therapeutics. He was alert and active in the affairs of the college. At this time he was plainly more interested in gynecology than in materia medica. In fact, he later became professor of gynecology and was known as a remarkably rapid and skilled operator. For his lectures on materia medica, he always had his assistant write on the board from notes that were somewhat yellow with age, a syllabus which he faithfully followed. Usually, in alphabetical order, he discussed aconite, then belladonna, cannabis, winding up with zinc. There was but little of

pharmacology. He was a friend of the students, who often had to consult him at time of entrance or of graduation. Many remembered his acts of kindness. He was fifty-five years old when, in 1899, he died suddenly of an anginal attack due to obstruction in a coronary artery.

Joseph P. Ross was our professor of diseases of the chest. He was a good family doctor, whose main stock in trade was the stethoscope, the use of which he had learned from Austin Flint. He was shrewd, farsighted, and did much for practical medical education. It was largely due to his efforts, his wire-pulling and writing of newspaper editorials, that County Hospital was given its present site, and Rush College and the Presbyterian Hospital were located near by. He realized that better service would be rendered to the sick and better training given to the medical student if hospitals and colleges were near neighbors. Impartial medical history of Chicago may perhaps be justified in looking upon him as the father of what is called today the "West Side Medical Center," with the huge County Hospital, several other private and semiprivate hospitals, medical and dental schools, research institutes, and nurses' homes. The group is steadily growing. We youngsters did not regard Dr. Ross as scientifically very well informed or scholarly. "Gentlemen," we used to mimic him, "we will now discuss the pathology of tuberculosis. There are two kinds of tubercle, the gray and the yellow. We now pass on to the symptomatology of the disease."

Edward L. Holmes, the professor of ophthalmology, who came to Chicago in 1856, was for long the leading oculist in the Northwest. He was chiefly responsible for the founding of the Illinois Charitable Eye and Ear Infirmary on West Adams Street. He also was for several years the leading spirit in the affairs of Central Free Dispensary, which served as an important adjunct to the college in the way of clinical teaching. He was elected president of Rush in 1890, serving until 1898. Dr. Holmes was plain in appearance, tall, gaunt, and simple in manner as in dress. He was modest and retiring by nature. It

was told of him that, when he appeared before the class to deliver his first lecture, he was so timid and embarrassed and so upset by the noise and uproar that greeted his appearance that he gave up trying to speak and withdrew. A stranger listening to his plain, practical lectures might well be excused if he failed to see in this simple man the scholar and scientist who, moreover, had vision as well as constructive and executive ability.

William H. Byford had gone with N. S. Davis, who left Rush in 1859 to found the Chicago Medical College. Dr. Byford later came back to Rush and was our lecturer on gynecology. He was the pioneer gynecologist of the Northwest. His textbook was used in medical schools for many years. During my student days he lectured twice a week at four o'clock. He was always prompt, always deliberate, always dignified, as, putting his tall hat on the table and adjusting his glasses, he took out his class list and quizzed for a few minutes on the subject of his preceding lecture. His lectures were delivered without notes. They were plain, straightforward talks, with no repetition, no citing of his own cases. He stopped the moment the bell rang, bowed politely, took his hat, and walked out.

For his examination he wrote on the board in large letters "Fibroid Tumor of the Uterus," then said quietly, with a twinkle in his eye, "Now write all you can about fibroids, pathology, symptoms, diagnosis, treatment. I can tell what you know from the way you answer this one question as well as from asking half a dozen."

Dr. Byford died in 1890, apparently from angina pectoris. In character, he was, as Dr. Lyman expressed it in an informal obituary talk, "as clear as crystal."

The Commencement exercises of our class—there were 135 of us—were held in Central Music Hall at the southeast corner of State and Randolph Streets, on February 21, 1888. President Allen delivered the main address; Professor Parkes gave an eloquent eulogy in memory of Moses Gunn, who had died during the college year. As I had been elected valedictorian, it was my lot to take part in the exercises. My family was quite resentful

when the newspaper reporter facetiously referred to my blond complexion and beard and said my address was "rhetorical in the extreme." As today I recall the circumstances and reread the address, both the facetious remarks and the criticism were quite justified. I may add, however, that my address "went over" with the audience, with my classmates, with members of my family, and with Dr. Hyde, in whose clinic and office I had acted as assistant during the year.

So, with the sheepskin in my hand and a gold watch and chain from Father and Mother, I started out, officially declared to be qualified for practice. A few days later this qualification was made legal by the receipt of a license from the state board at Springfield. I was a doctor of medicine, aged twenty-six and one-half years.

CHAPTER V

Hospital Intern and Attending Physician

Were I to place a man of proper talents in the most direct road for becoming truly great in his profession, I would choose a good practical anatomist and put him into a large hospital to attend the sick and dissect the dead.

WILLIAM HUNTER

THE outstanding training school for recent graduates from the medical colleges of Chicago was the Cook County Hospital. An internship there was the annual prize that aroused the keenest competition. It was well known that the hospital had its shortcomings. It was under political control; at times it reeked of graft. On its attending staff were many incompetents, who sought appointment chiefly for the advertising it gave them. There was no laboratory equipment, and research was almost completely neglected. The opportunities for medical education were poorly appreciated.

Yet the embryo doctor was eager to win out in the competitive examination, for he believed that eighteen months spent in the wards gave assurance of future success. In the list of alumni of the County he saw the names of such men as Nicholas Senn, William E. Quine, Frank Billings, J. B. Murphy, L. L. McArthur, William T. Belfield, Malcolm L. Harris, Stanley Black, and others. He realized that men of their caliber might have been successful without the internship, but they unani-

mously testified to the value of the training they had received even in the earlier days when the hospital was small, inadequately housed, and poorly equipped. He was told that there would be, compressed into his year and a half of service, an experience richer both in quantity and in quality than would ordinarily fall to his lot in ten years of general practice on the outside.

This was true. The beds were there—about 750 in 1888—and in each was a patient. From his first day, the intern came into close contact with all types of serious illness, acute and chronic. Patients with minor ailments were rarely admitted to the wards. Moreover, the rotational service was so arranged that for six months the new man was attached as assistant to a senior who had been in the hospital for one year. The junior was, therefore, guided and even ordered in his work by one older in the service. This arrangement offered a safeguard against serious blunders; major responsibility rested on the senior. From morning to night every house officer was busy with the practical application of the knowledge that he had gained from lectures and books. He was under an urge to do his best because his skill in diagnosis and treatment was pitted against that of his colleagues, many of whom were from other schools. Besides, he had a wholesome respect for what might be shown by the subsequent history of the case or by the operation. And most chastening and salutary lessons were often taught by the revelations of the dead-house.

Another asset was that the hospital was rich in tradition. Ever since 1866, when the first two interns, Drs. N. T. Quales and J. M. Hutchinson, had been appointed, there had been handed down, from one generation of interns to another, facts that were not found in any textbook—knowledge concerning certain symptoms of disease, a special splint or bandage, a favorite prescription, a particular incision in an operation. This knowledge was passed by word of mouth in the talk at table or at conferences between colleagues of the house staff. An intern might be lazy, but, unless he was uncommonly dull—and the

competitive examination pretty effectively eliminated the dullard—he could not help learning a great deal by the simple process of absorption. Of course, as is the general rule, what he got out of the work was proportionate to what he put into it. The lazy and indifferent man learned comparatively little. The industrious man who took advantage of his opportunities learned much.

Then, while many of the attending staff were poorly fitted for their duties, there were always good men among them. To serve under Christian Fenger, J. B. Murphy, Norman Bridge, or P. J. Rowan was a rare privilege. Not only were they eminently qualified as practitioners of surgery and medicine; they were also approachable, friendly, wise in counsel, and always ready to help by suggestion, by imparting information, or by affording the younger man an opportunity to exercise his own skill in operation, diagnosis, or treatment. They were genuinely inspiring men. They were our heroes in the days of 1888, and they remain such in memory today.

The eighteen months of internship were divided into three services of six months each: a junior service, consisting of three months in surgery and three in medicine; a middle service, of three months in the examining room and morgue, together with some eye and ear work, and three in obstetrics and gynecology; and a senior service, of three months in surgery and three in medicine.

I entered on April 1, 1888. As I had made first place in the competitive examination, I had first choice of the senior intern with whom I should be associated for six months. I chose Albert I. Bouffleur. He was a graduate of my own school in the class of 1887 and had a good record in college and in the hospital. Another fact that influenced my choice was that Bouffleur was to have as his attending man Christian Fenger, who was regarded as the most desirable surgeon under whom to serve. My classmate, Herman R. Wittwer, who was to be my house-staff colleague on the companion service, chose another Rush gradu-

ate of the class of 1887, E. J. Mellish, who would have J. B. Murphy as his surgical chief. Wittwer and I were certainly fortunate, for we had most intimate contacts with Drs. Fenger and Murphy. At Fenger's major operations, Bouffleur was first assistant and Mellish second; I had charge of the instruments, while Wittwer gave the anesthetic. When Murphy operated, Mellish was first, Bouffleur second assistant, Wittwer handled the instruments, and I gave the anesthetic. One year later when we became senior surgeons, we also had the rare privilege of having the same surgical chiefs. In medicine we appreciated highly having as attending men Norman Bridge and P. J. Rowan.

It was the unwritten law that during his six months as junior an intern must have a clean-shaven face. So, just before entering the hospital, I sacrificed my luxuriant beard and mustache. Wittwer defiantly declared that he would not shave. The first evening, he was seized by the older interns, who, in spite of his violent resistance, held him down, lathered his face, and shaved off half his beard and mustache. His captors sarcastically said that they would generously leave him the other half. He wisely finished the job.

I took my duties very seriously. After three days of hard work I was so exhausted physically and so upset emotionally that sleep was all but impossible. I recall getting up at midnight and going to the ward to see if I could not do something more for a poor Italian who was suffering from a severe septicemia that had followed an accident. The high temperature, the rapid pulse, the chattering delirium, and the picking at the bedclothes were like a nightmare that drove away my sleep. Next day, Dr. Bouffleur noticed my upset nerves and told me that I must steel myself against such a reaction. When everything humanly possible had been done for a patient, as in the case of the Italian, who, he said, was hopelessly ill, it was useless and foolish to waste time trying to do more. Reserve such efforts for cases in which there was hope that watchful care might save a life. I gradually became, not hard hearted, I am sure, but emo-

tionally hardened and relatively insensitive or immune, so that I could witness pain and suffering with an equanimity that surprised me.

The hospital was under the control of a board of fifteen county commissioners. In 1887, an orgy of lavish expenditure of money had suddenly been ended by the indictment of many members of the old board for malfeasance in office. Later, several of these men were convicted of corrupt practices and sent to the state prison at Joliet. The old "boodle" warden, McGarigle, escaped punishment by fleeing to Canada. The new hospital authorities, who had been appointed by the recently elected "reform board," felt called upon to set a record of honesty and economy. But their efforts at honesty were often a mere quibbling over trifles; their economy degenerated into parsimony. Patients, interns, and members of the hospital personnel had to get along with poor and insufficient food. We were annoyed by the short supply of clinical thermometers; catgut of inferior quality and a lack of surgical needles led at times to unfortunate results in operations. The older interns said openly. "Oh, for the days of unlimited graft rather than this niggardly economy!"

In spite of these drawbacks, we tried to render faithful service and to learn as much as possible from the opportunities offered in the wards. And our experience was most profitable. Within the four walls of the hospital we were leading a life similar to that which the average graduate leads outside. But our life was concentrated and was carried on at an accelerated tempo. We had no long wait before getting even a few patients. They were there in such numbers, and afflicted with diseases of such extraordinary variety, as to make us wish at times that cases were fewer so that we might study them more thoroughly. We had to meet emergency calls that demanded prompt response and often immediate treatment. Other cases called for more deliberate study, perhaps for consultation with a colleague or advice from our attending men. We had to learn how to get along with anxious, inquiring, or complaining relatives and friends of

patients. In the corridor, in the ward, or in our rooms there was much informal exchange of ideas that was both stimulating and instructive. Animated discussion over concrete cases frequently relieved the monotony of an otherwise dreary meal. Whenever a little group met about the necropsy table, we were sure to compare notes.

We profited from these contacts with one another not alone because we might differ in opinion but because our personalities were quite different. Mellish was deliberate even to slowness, yet he was thorough Bouffleur and Walter Allport never agreed on anything. They argued and accused each other of underhandedness in the transferring of patients and of trying to get the advantage over the other in choice of operating rooms. The score was about even. We rather enjoyed the exchange of personal remarks at meal times, though some of us felt that such conduct was unseemly and generally unprofitable. One of the finest men was Everett J. Brown, of Decatur, Illinois, who came in with Fred Jenner Hodges from Northwestern at the same time that Wittwer and I arrived. Brown was cultured, quiet, poised, and earnest. His death several years later from pernicious anemia, after a distinguished career as the leading practitioner in Decatur, was a great loss to the profession. Hodges was bright, shrewd, and rather easygoing. He, too, died young, leaving two sons who have made names for themselves as radiologists.

The life-story of Herman R. Wittwer, with its elements of adventure, pathos, comedy, and tragedy, deserves more space than can be given to it in these memoirs. He was a Swiss who came to Wisconsin soon after he had finished his course in the *gymnasium* in Berne. He was a most likable, kindly, and self-sacrificing fellow, popular with the attending and house staffs as well as with the entire hospital force, from the warden down to the scrub woman. Nurses were fond of him, and two or three of them completely lost their heads over him. This popularity was certainly not due to an attractive manner of dressing. He was careless about his clothes and always wore ragged, seedy suits. He was jovial and sporty. He openly took beer from the

icebox in the ward and shocked the nurses by drinking it on the spot. He talked frankly of his escapades that violated our American—"puritanic" he called them—notions of morality. He was a tireless, though unsystematic, worker, a keen diagnostician, an excellent operator.

Though we were much unlike each other, Wittwer and I became pals. The intimate confidences that he made to me showed a genuine affection, which I reciprocated. He kept his promise not to drink during our senior surgical service. He liked to talk of the roistering student life in Berne, enjoyed singing German student songs like "Was kommt dort von der Hoh' " or "Madele rück, rück, rück an meiner grünen Seite." In our male quartet he sang first tenor, Clarence Earle second tenor, I first base, and Fred Hodges second bass. We sang in our rooms, in the wards and the corridors, often, I am sure, making a nuisance of ourselves.

Wittwer's career had a sad ending. Soon after leaving the County in October, 1889, he went to Berne to work under Kocher, especially on goiter. He returned to Chicago to become the assistant of Dr. J. B. Murphy on a five-year contract. I recall vividly how one day I met Dr. Murphy on the street. He asked me whether Wittwer was not the best man he could get as an assistant. My reply was that I knew no one more capable, no one who would work harder—"but, Dr. Murphy, you will not be able to control him. He is and always will be, a bohemian by nature, a free lance, who will chafe under restraint." I reminded him of Wittwer's loose practices. I felt Murphy should know that Wittwer had become addicted to cocaine, using it, first, for the relief it gave him during asthmatic seizures associated with a nasal trouble. Dr. Murphy's reply was: "Herrick, I can handle him. What's his address?" He cabled; Wittwer came; Murphy failed. Wittwer soon became popular as a physician, but he kept appointments irregularly and spent a good deal of time in the near-by saloon. When Dr. Murphy remonstrated, he became rebellious. In addition to cocaine for his asthma, he began to inhale chloroform at night as a hypnotic. Nephritis set

in. One morning poor Wittwer was found dead in bed with a half-empty bottle of chloroform beside him. Whether the overdose was accidental or intentional was never determined Herman Wittwer was one of the most brilliant, companionable, and lovable men I have ever known.

Other members of the house staff deserve mention.

Clarence Earle, who was six months ahead of me, was a hard worker, capable, never quiet, always eager to sing, a worshiper at the shrines of Christian Fenger and Ludvig Hektoen. Earle's hyperenthusiastic proclivities led Fred Hodges to dub him "Crazy Clarence," by which name he came to be generally known.

The studious, quiet, always dependable George Weaver entered the hospital with the new group in April, 1889, and became Wittwer's junior. My junior was the eccentric Edmond Moras, who, attracted by the popularity of Wittwer, tried to imitate him, with poor success; for, lacking the innate friendliness of Wittwer, he copied only the superficial habits like beer-drinking and the use of cocaine. After graduation, against the advice of older men who said his fiancée had tuberculosis, Moras married a nurse, who died of consumption soon afterward, leaving him a child with a tuberculous spine. In a streetcar accident, Moras lost an arm. He went wrong by writing a quackish book on endocrinology—"Autology" he called it. In the end he was dropped from the list of reputable physicians by local and national societies. He once obtained front-page notoriety by writing a letter—clearly the work of a cocaine addict—demanding one million dollars of a prominent Chicago merchant. Somewhat later, death kindly closed his tragic career.

Henry F. Lewis, a graduate of Harvard Medical School, who entered in October, 1888, was an odd, bright chap, full of fun. His special delight was to stir up the wrath of the homeopathic interns who had recently been given representation in the hospital. In one of the medical wards the "homeos" had about ten beds, while the regulars had about forty. Before starting to make his morning round in this ward, Lewis would say to the

nurse, "Yesterday was aconite day, wasn't it, and day before that calcaria carb.? Today we'll try belladonna." So, to every complaining patient he prescribed belladonna "30x"—i e., the thirtieth homeopathic dilution—and he took pains to draw out complaints. For headache, dizziness, tired feeling, sleeplessness, rumbling in the bowels, palpitation of the heart, itching of the skin, on that day there was ordered "30x" belladonna. The homeos resented what they called his insulting action, but he contended that if it seemed ridiculous when he prescribed these high potencies, why was it not ridiculous when they prescribed them?

The homeopathic interns—Willard, Rich, Roberts, and White—were nice fellows, with whom I maintained most friendly relations in the County and later in practice. At this writing, Dr. Willard is still in practice in northern Michigan, honored there, as wherever he has worked, for his integrity, friendliness, and skill.

With Ludvig Hektoen, there began a friendship on the day of my entrance to the hospital that for more than sixty years has remained unbroken. I shall have more to say of him further on.

In 1880, an Illinois Training School for Nurses had been organized. The male nurses had been almost entirely replaced by women. The nursing was excellent. The first head of the school, Miss Mary E. Brown, had established a high standard of training, which was maintained by her successor, Miss Hemple. Miss Isabel Hampton became superintendent in 1886. Miss Hampton was eminently fitted for her task. She had high ideals, yet she was practical. She put into operation a course of training of a still higher grade. She was of pleasing, commanding presence, always dignified. She was respected by her nurses, for she was just. She could be stern when she detected laxity, severe when there was deceit. I came to know her well and found her decidedly human, considerate of others, and, moreover, possessed of a sense of humor. It was a pleasant surprise when during my senior service I was asked to be the attending physician to the

Nurses' Home. This position—"court physician" it was called—was looked upon by the house staff as a special honor or, as some of the disaffected termed it, a special favor. There was also a "court surgeon."

In 1889 Miss Hampton went to Baltimore, where she organized the Johns Hopkins Hospital Training School. She made an enviable record. In 1899 she married Hunter Robb, the gynecologist. They moved to Cleveland, where in 1910 she met a tragic and too early death in a streetcar accident. She was an unusual woman; to know her was a rare privilege.

The social life of the interns was, on the whole, rather drab. Perhaps once a year there was a party at the Nurses' Home. More or less secret parties, made up of one intern and one nurse, were not uncommon. At the County, as elsewhere, not a few of these friendships ripened into marriage. Some of the boys often went to the theater or the ball games. A few of us played handball out near the morgue. Some spent their spare time in reading polite literature or indulged in detective stories. Fred Hodges and I often played cards, almost always California Jack, i.e., High, Low, Jack, and Game, and he generally came out ahead.

There were always minor jokes such as would occur in any group of men between twenty-one and twenty-seven. One of the major pranks that attracted wide attention deserves recording. To the east of the hospital there was a vacant area extending to a three-story brick building at the southwest corner of Harrison Street and Hermitage Avenue, the west wall of which building had no windows. On this wall was painted a huge bull, advertising Bull Durham Tobacco. The first floor of the building was occupied by the popular saloon of Tommy O'Connor. One morning all the east windows of the hospital were filled with giggling, chattering persons—the warden, doctors, nurses, patients, clerks, and orderlies—all looking and pointing toward the tobacco sign. During the night a well-executed job of painting had converted the bull into a cow. There was no mistaking the change. The newspapers made a good story out of it. We

interns hired boys to go into the saloon with tin pails and ask Tommy for milk. His friends razzed him; urged him not to give up the paying whiskey business for a dairy job. Tommy didn't like the joke at all; finally he got good and mad. He vowed he would find out the culprits and make them sweat for it. Though he hired a detective, he never succeeded. Only a short time ago Ludvig Hektoen, now a sedate octogenarian—at least supposedly sedate—admitted to me that he and Fred Jenner Hodges, one morning about two o'clock, had done the job. The statute of limitations will, I am sure, protect Dr. Hektoen from any prosecution.

Among my treasured mementos of the County is a photograph that recalls the visit to the hospital of Friedrich von Esmarch, the distinguished surgeon from Kiel who was then making a tour of the United States with his wife, a princess of royal blood, the aunt of the man who became Emperor Wilhelm II. Dr. Fenger, as a member of the surgical staff of the hospital, acted as host. He had asked Dr. Senn to be present. A reception was held in what was known as the "intern's parlor," a large, coldly furnished room in the front of the administration wing of the hospital, a room almost never used but which had been dusted up for the occasion.

There had to be a photograph. Clarence Earle, at that time our official photographer, grouped us, with the princess and Mrs. Fenger and Von Esmarch seated in the center, Fenger and Senn on the flanks. Back of them were the interns. Clarence focused the camera and then took his place in the group, leaving the camera and the exposure of the film to Miss Jackson, the hospital housekeeper. Miss Jackson was about to open the camera shutter when she noticed that Mrs. von Esmarch had a veil partially drawn over her face. Miss Jackson called out, "Oh, lady, please remove the veil; we want to get your face." The princess smilingly said she preferred to have the veil as it was. Miss Jackson who was no respecter of persons, ignorant of the fact that she was taking undue liberty with royalty, stepped up to the princess, and without more ceremony, lifted the veil.

"There, that's better," she said, went back and snapped the camera. The princess was a lady and showed no resentfulness by either word or look. Mrs. Fenger and others were shocked at such an exhibition of American lack of good manners. And then what did "Crazy Clarence" do but call out, "Let's sing." The visiting couple, of course, said they would be delighted to hear us. What these cultured visitors thought of our crude rendering of their own German music will never be known.

Dr. Senn capped the climax of our gaucherie. As Senn and the great German surgeon were looking out of the north window, Esmarch read the large inscription on the front of the tall building facing him: "The College of Physicians and Surgeons." "Ah! What college is that?" he asked. "Oh," replied Senn, "that is a small second-rate school that amounts to little. Rush College is the only one that counts." The rudeness of the remark is seen when one considers that Senn had only recently come to Rush from the College of Physicians and Surgeons. Moreover, it was a cruel remark to make, for Dr. Fenger, at the moment Senn's host, held the chair of surgery in what Senn had referred to as a second-rate school beneath consideration.

In reality, Senn and Fenger had the highest regard for each other. The former's overweening vanity led him on occasion to make extravagant statements or commit egregious blunders of this sort. The cultured Dane was of more genteel breeding than the bourgeois Swiss. Once when someone reported to Dr. Fenger a slighting remark that Senn had made and hinted that Fenger ought to resent it, the latter understandingly and charitably replied: "Oh, you know Senn is a peasant."

Well, it was a great day when Esmarch came. What the distinguished couple thought of it all will never be known. I imagine they were broadminded enough to overlook our shortcomings and to realize that we were attempting, in an amateurish way, to honor a great surgeon of world-wide fame.

Certain incidents of my intern days stand out in clear relief. Accidentally I discovered an albuminuria in myself. My fright

was not lessened when Professor Haines told me that, while there were casts galore, they were "very, very delicate, only of the hyaline variety." Dr. Bridge added to my alarm when he said, "Now, wait a minute; let me listen to that second heart sound again." Then, after much hesitation: "No, it is all right, I am sure." For years afterward I had no ache in the back, no twinge of pain in the chest, or even a slight thump of the heart, that I was not sure of nephritis with secondary heart changes. It may have been postural albuminuria or a so-called "albuminuria of adolescence." More likely it was a toxic affair due to excessive inhalation of chloroform, which anesthetic—for just what reason has always been a puzzle to me—was given during our junior surgical service. It might have been due to the absorption of mercury, for before operating we scrubbed our hands in a solution of bichloride until they were as hard as leather, with fissures and cracks that often bled.

Either late in 1888 or early in 1889, Dr. Hektoen and I tried to stain the tubercle bacillus. This had never been done before in the hospital. Dr. Hektoen had read up on the technic—the old tedious aniline oil process—and had the necessary reagents. We knew the germs must be in the specimen of sputum which we had obtained from an unquestioned case of pulmonary tuberculosis, yet after two hours of patient search we failed. Better luck followed later attempts. It is difficult for one using the simpler staining method of today to realize how tedious and crude was the earlier method.

The cases that I remember most distinctly after the lapse of nearly sixty years are those in which there was some striking success or failure in diagnosis, some excellent or dismaying result of treatment by drug or by operation. Bouffleur and I took to heart, as did Dr. Fenger, the death of Dan B., following a severe major operation for vesico-intestinal fistula. A correct diagnosis had been reached by thorough study. Unusual care had been exercised during the operation. Several times there had been delay, caused by poor catgut ligatures that broke when they were pulled tight. The post mortem examination showed a

peritonitis that had been caused by a leak due to a ligature that had slipped or given way after the operation. Even now I can see Dr. Fenger as, after learning the cause of death, he stopped in the corridor, shook his fist in the direction of the warden's office, and in Anglo-Danish cursed the niggardliness that forced us to use unsafe material. "Reformers? No!" he shouted, "No! Murderers!"

A disreputable woman of the street, an alcoholic, came in with a neglected unreduced dislocation of the shoulder. While I was giving the chloroform and before the attending surgeon had made any attempt at manipulation, the patient's breathing and heart action suddenly stopped, and we were unable to bring her back to life. No assurance from others that I had been careful, that the patient was a good-for-nothing reprobate better dead than alive; that the autopsy had revealed fatty changes in the heart probably due to alcohol—none of this relieved me from a sense of guilt. A I walked through the wards it seemed to me that doctors, nurses, and patients looked at me as solely responsible for a death on the table. For two or three distressing days and sleepless nights I suffered extreme mental torture.

In my senior medical service my junior and I, through an inexcusable error in diagnosis, tapped a distended bowel, thinking we were dealing with an ascites. The history, belatedly taken, was that of a rather acute intestinal obstruction. I telephoned Dr. Murphy of the accident, saying I thought a laparotomy should at once be performed. He came promptly, opened the abdomen, found a torsion ileus, said he could not locate the leak in the bowel from the trocar puncture. There was some peritonitis, evidently a day or two old. The patient died several hours later.

Lessons like this make indelible impressions. The old saying that more mistakes are made through haste, carelessness, or neglect than through ignorance is true. But, alas, we are all prone to forget.

One day while I was a junior, Dr. Norman Bridge gave me a scare and a thrill. The scare came when, after reading a history

sheet—it was a case of mitral stenosis—he abruptly said, "Who wrote this history?" My face flushed hot. Expecting to be jumped on, rather defiantly but prepared to take my medicine, I replied, "I did, sir!" "Write more like it," he said, and walked on to the next bed. There was the thrill.

During a hot spell one summer day, heat prostration and sunstroke cases were coming in fast. A Mexican was brought in with a temperature of over 102°, a full bounding pulse, and marked cyanosis. He was semicomatose and soon had a convulsion. We put him in one of the private rooms of the ward, and I started to bleed him. Though a senior, I had never bled a patient. As I was working, the door opened, and Dr. Rowan came in and asked what I was doing. I told him the history and hoped he approved the venesection. "Of course, it's the right thing to do," he said. "Go ahead." I wondered why he waited. I fussed over the little operation with my head well down, close to the arm. When all seemed ready, with a quick cut I opened the vein and got a big spurt of blood in my face and hair and over my gown. Dr. Rowan said, "That's what I was waiting to see. I'll go now." I could hear him chuckling out in the hall.

Dr. Rowan was one of the best practitioners I have ever known. After I left the hospital, our paths often crossed. He possessed an unusual fund of common sense. Moreover, he was kindly toward his patients and his colleagues.

Here is an illustration of Dr. Rowan's diagnostic skill. In the morgue one day I found Dr. Walter Allport sweating and swearing over a post mortem. On inquiry he said that the body was that of a patient who two days before had entered in a semistuporous state, with dry tongue, fever, and so on. Allport had gotten a fairly satisfactory history from the relatives and was sure the patient had typhoid fever. As Dr. Rowan was making rounds, Allport spoke about the new case and of his diagnosis of typhoid and expressed the opinion that the patient would recover. Allport continued in his talk with me: "And what do you think that attending man did? He just stood at the

foot of the bed, listened to my talk, never touched the patient, just sort of laughed, and said, 'Typhoid? Get well? No. When you post him tomorrow be sure to look at the brain.' " "And," continued Allport, "I argued, and he just laughed. Now I can't find a thing wrong in the abdomen, no typhoid, and I'll have to look at the brain." This he did and found a fair-sized tumor. "Damn that Paddy Rowan," was his comment. "How he can make a diagnosis like that from the foot of the bed beats me."

Much of Dr. Rowan's kindliness, common sense, modesty, and diagnostic acumen was transmitted to his son, Charles J. Rowan, who became a most popular teacher of surgery at Rush and at the University of Iowa. He died in California in 1948.

During my middle service in the first quarter of 1889 I was fortunate in having three extra months in medicine. One day during this period when Dr. Bridge was making rounds in the medical ward, I asked him to look at a patient who, I thought, had perityphlitis because he showed fever, right iliac tenderness, and a mass. Dr. Bridge confirmed the diagnosis. He asked me to transfer the case to the surgical side and to be sure it got on Dr. Murphy's service. "He's interested in those cases. He believes the appendix is at fault, and they should be treated by operation." The transfer was made, Dr. Murphy operated on a periappendical abscess, and the patient recovered.

Years later I called Dr. Murphy's attention to the fact that my hospital notebook showed that a patient, L. Z., whom I had watched for a few days after his admission on February 11, 1889, was transferred from the medical ward to the service of Dr. J. B. Murphy for perityphlitis. Dr. Murphy remembered the incident. In the *Journal of the American Medical Association*, Volume 22 (March 3, 1894), is an article by Dr. Murphy, "Appendicitis with Original Report, Histories and Analysis of 141 Laparotomies for That Disease under Personal Observation." Case 2, under date March 2, 1889, is described as: "L. Z., age 19, Cook County Hospital. Appendicitis with perityphlitic abscess. The appendix, firmly imbedded in adhesions was not removed. A bean-sized fecal stone was present." After drainage

the lad recovered. I believe this was the first case in which Murphy operated with the definite idea that he was dealing with a primary inflammation of the appendix. Case 1, which he cites, was one in which he opened a perityphlitic abscess on November 9, 1885. This was before Fitz in his classical paper of 1886 had shown that appendicitis was the cause of perityphlitis, so that Dr. Murphy's notion of the relation of the condition to the appendix must have been hazy. Anyhow, I like to think that, through Dr. Bridge, I had a minor part in starting Dr. Murphy on his brilliant career as the leading Western champion in the battle that was waged to establish appendicitis as a surgical disease.

In the hospital, as in private practice, the doctor is often blamed unjustly for the unfortunate outcome of an illness, or, on the contrary, he may get credit for a good result which he realizes was brought about without his help. Some patients left the hospital in a critical, fault-finding mood, others expressed gratitude for good care and skilful treatment. A large proportion were noncommunicative. Many illustrations could be given; I mention but two.

A tough young chap was admitted to the surgical service of Dr. Bayard Holmes in a serious toxic condition due to a gas gangrene that had extended from the leg to above the knee. The patient explained that he had received a charge of bird shot in the back of the leg while he was running away after committing a robbery several hours before. Dr. Holmes was sure that the patient would die unless immediate amputation above the knee was performed. He directed Wittwer and me to operate, one of us doing the "dirty work," that is, the amputation proper; the other was to finish the job with clean instruments and towels, fresh nurses and assistants, tying arteries, sewing up and dressing the wound. Dr. Holmes stood by and saw that there were no flaws in the aseptic procedure. The man made a good recovery. All of us felt proud over the successful outcome—we had saved a life. It was perhaps twenty-five years later when one day in the corridor of the City Hall I saw a one-legged man sitting in a

low chair in charge of a bootblack stand. His face was familiar. In answer to my query if he didn't remember me, an ugly look came over his face, and he surlily replied: "Yes I do. You'se de guy what done me dirt in the County Hospital. If I'd known wot I knowed later, I'd a shot you. The nurses told me that you and the other doctor cut off my leg just so you two fellows could practice on me." I didn't continue the interview. It isn't always wise to begin conversation with a supposedly grateful patient. It is safer to let him make the approach.

But some patients were grateful. Two or three years after leaving the County, on a bright sunny day I was standing with Dr. Weller Van Hook on the steps of his office on Leavitt Street. While we were chatting, a wagon with a huge rack piled high with manure that had been collected from the livery stables which at that time were numerous, slowed up and the driver from his lofty perch called out cheerily: "Hello, Dr. Herrick! How are you? You remember me, don't you? I'll never forget *you*, doctor; you saved my life when I had pneumonia in ward 4 in the County Hospital. So long, Doc." As he drove away, Van Hook quietly said: "Who *is* your fecal friend?" This has always seemed to me a perfect bon mot, reminiscent of Beau Brummel's "fat friend" comment concerning George IV, at that time the heir apparent. Van Hook was unusually capable along these lines.

A word may appropriately be said here about Drs. Holmes and Van Hook. Bayard Holmes for a few years was a sort of big brother to many of the younger men, especially of the County Hospital group. He was one of Chicago's earliest bacteriologists. He had little sympathy with the old fogies who did not believe in, or did not understand, the germ theory. He stimulated us to keep abreast of the times by subscribing to German medical journals. Yet he was erratic, lacked balance, and often showed poor judgment. I recall how when I was senior medical intern I asked his opinion regarding a lump on the forehead of a patient of mine. Dr. Holmes declared the small mass was a sarcoma and should be operated upon at once.

He pooh-poohed the fact that, according to the history, a year before, the young man had had a similar lump that had disappeared after some "drops" had been taken. "No, Dr. Herrick, this man is ignorant, is probably lying to escape an operation. He's your patient, however, and if you wish to try using iodide, as you suggest, the responsibility is yours, but it's a waste of valuable time." I took the responsibility. At the end of a week under twenty drops of a saturated solution of iodide of potassium three times a day, the lump melted away as if by magic. It was unquestionably luetic in character. The man remained a most grateful patient for years. He died at seventy of a cerebral arterial condition that might well have been luetic.

Dr. Holmes was as radical in political and social matters as in medical ones. Once he ran for mayor of Chicago on the Socialist ticket. He was profoundly upset by family troubles, particularly the illness of a son, who suffered from dementia precox. He disappeared from the medical scene—just when, where, and how I never knew.

Weller Van Hook was a dear friend of about my age, with whom in the early years of our practice I was very intimate. In oral debate, as in writing, he showed a remarkable mastery of English, with a gift of sarcasm comparable to, though less harsh than, that of Jonathan Swift. He was a pioneer in Chicago in bacteriology and pathology, an inspiring teacher, a capable investigator, and a superior surgeon. He gave promise of a brilliant career. Yet after a few successful years he failed. He was one of those who are robbed of the acclaim of posterity by unsuspected weaknesses. He was lacking in that type of practicality that enables one to get on with one's fellows. Oversensitive to criticism, proud to a fault, he would not meet another halfway. When he was betrayed by a supposed friend, he imagined that the whole profession was against him. For several years he endured as a martyr what was really a self-imposed ostracism. He took refuge in theosophy. Then, when age and ill health were against him, he tried to regain his old position in surgery. But it was too late. When Scotch reviewers unfeelingly

attack, may it not at times be better to fight back with the ferocity of Byron than meekly to wilt as did the hypersensitive Keats?

On September 30, 1889, my term as intern ended. I said goodbye to colleagues, nurses, orderlies, and patients. A sense of loneliness akin to homesickness came over me with the realization that I was severing ties with an institution for which, in spite of its many imperfections, I had a feeling of genuine affection. As it turned out, my connection with the County Hospital was to continue for many years.

I shall here break the chronological order of my story to give a brief outline of my years as attending physician.

My appointment to the attending staff on January 1, 1890, came about through a chance remark made to me by Fred Jenner Hodges. He called my attention to the fact that on the board of Cook County Commissioners was a friend of mine, Mr. O. D. Allen, from Oak Park, through whom I might perhaps secure an appointment on the staff. After thinking the matter over for a day or two, in my perplexity over the questionable propriety of such an act, I appealed for advice to Dr. Norman Bridge. "Why certainly take it if you can get it for the mere asking. As you say, you are young, but salve your conscience with the thought that you will be keeping off the staff someone more poorly qualified for the job than you are." I took his advice and for twenty years was an attending physician at the County. The only price paid for the appointment was an annual note of thanks, with a box of cigars to my sponsor. When he was no longer on the board, I made a more definitely direct "political-pull" approach through a prominent politician. No money was ever offered or free medical service rendered by way of payment.

Later, my appointment continued by means of a competitive civil service examination. This improved method of choosing the attending staff was the result of the efforts of Doctors Fer-

nand Henrotin and Frank Billings. At the end of the six-year civil service term I retired, being appointed on the consulting staff.

These were years of happiness that could not help bringing a rich reward in experience. The results were in direct proportion to the time and energy put into the work. One learned not only from a study of the hundreds of interesting, puzzling, and rare cases but from the stimulating contact with bright young interns, who repaid all efforts to help them, by rendering loyal service. They sorted out knotty cases for joint study, and often called attention to those that were peculiarly suited for presentation in my amphitheater clinic, which was given every week. We worked together to put to practical application the newer facts and concepts of bacteriology. We learned the technic of the Widal test. Laborers on the drainage canal fresh from Italy, infected with the aestivo-autumnal forms of malaria, offered a fertile field for study of the clinical and pathologic aspects of the disease. The poor housing conditions and insufficient food offered these workers by the greedy canal contractors, as well as the soup lines in Chicago—for it was in the years of depression—also brought in quite a number of patients suffering from malnutrition and anemia and several cases of frank scurvy. We were on the lookout for myxedema and exophthalmic goiter and other disturbances of the ductless glands. We began to distinguish more accurately the types of anemia and the leukemias. As my interest in the heart gradually increased, I was privileged, through the courtesy of members of the attending and house staffs, to see many cases of heart disease in wards other than my own.

I tried to remember that, while I as an attending physician had the privilege of profiting from the rich experience of the ward, I ought not to devote too much time to a study of the rare disease or to the solving of some knotty problem of diagnosis. I had a duty to perform in trying to instruct and inspire interns. Above all, I was not to forget that the patient ill with

some ordinary everyday complaint was entitled to my service.

Some of my confreres at times forgot this. One day one of the popular younger attending men, a capable, enthusiastic person, bustled into the ward accompanied by his senior and junior interns, three or four interns from other services, and the trained nurse. They were headed toward the new, much discussed, puzzling case in bed 20 at the end of the row. As the doctor with his entourage passed rapidly down the line, Mike Flaherty in bed 1 turned toward Ole Oleson in bed 2 and said: "Ole, we ought to be a hell of a lot better, the professor has just walked by." He was an Irish philosopher-humorist, whose comment, worthy of Mr. Dooley at his best, went straight to the core of the matter.

I am sure members of the house staff who were for a time on my service will not feel hurt if I pass them by without mention of their names and yet refer briefly to Howard Taylor Ricketts, who was a County intern in 1897–98. He astonished me by independently working out, in a three days' study, a diagnosis of solitary tubercle of the cerebellum, a diagnosis which later, by autopsy, was shown to be correct. His studiousness and the keenness of his logical mind were apparent at this early date. His modesty, amounting almost to shyness, aided in making his personality most attractive. His later career as a worker in Dr. Hektoen's laboratory, his investigation of Rocky Mountain spotted fever, his researches in Mexico City on the nature of Mexican *tabardillo*, or typhus fever, his death in 1910 at the age of forty from the disease he was studying—all this is well known. The Ricketts ward in the hospital in Mexico, the Ricketts Laboratory at the University of Chicago, and the name *Rickettsia* applied to the organism he discovered in the tick which is related to spotted fever perpetuate his memory as one of the martyrs to science whose untimely death is still lamented.

For several years I gave a weekly clinic in the amphitheater at the County. This was well attended by students from Rush and other schools, as well as by visiting physicians. This clinic was

my especial joy. It was not my belief then, any more than it is today, that the big clinic was pedagogically equal to the small ward clinic. The latter clinic, however, was impracticable in the County. Dr. B. W. Sippy and I once started ward work there on a plan modeled after the clinics given in Vienna by Kovačz. It was immediately successful and became so popular that other instructors from Rush and the other Chicago schools started similar classes. The wards swarmed with inexperienced, thoughtless teachers and eager students. The patients were unnecessarily disturbed, their proper care was interfered with, and soon teaching in the ward was abolished on complaint of the nurses and by order of the county commissioners. Under the circumstances, the decision was justified.

It was my aim to make the clinic more than a didactic lecture with a patient as a text. I tried to present cases through whose history, physical findings, method of examination, or discussion of treatment lessons could be taught to a group of two hundred as easily as to a group of six. Sometimes the lesson was taught by bringing a large number of cases of the same disease. Thus a dozen patients in the various stages of typhoid fever would be shown. The general resemblances were brought out, yet variations of onset or of the temperature course were stressed. Patients in the first weeks were compared with those in the later weeks. There were comments on the phenomena and treatment of hemorrhage. Pathologic specimens were passed around. At other times I would show one case for a few minutes only, dwelling on odd symptoms—like the *tâche bleuâtre*, permitting students, as they passed out from the clinic, to confirm what I told them and to see the spots and the *corpora delicti*, the crab lice.

All teachers know that no matter how carefully they express themselves, or think they do, they are often misunderstood. In clinic I had demonstrated on typhoid patients the phenomenon of "myoclonus"—the marked bulging or bellying contraction of the biceps humeri when it was sharply pinched, which sometimes caused a cramplike pain to the patient. That it might be

present in other infections or toxic conditions was plainly stated. About a year later a letter came from a recent graduate in Nebraska, asking for information about the reaction. He wished in a paper to be presented to a medical society to describe "Herrick's pathognomonic test," a sure diagnostic evidence of typhoid fever. My letter in reply headed him off from presenting a paper that might have greatly embarrassed me.

At times there was something dramatic about this large clinic. A most profitable hour was once spent on the case of a man whose story was that in the Philippines he had been shot in the neck, the bullet going close to the heat center, so that he had peculiar bouts of fever as a result. He was, he claimed, so nervous that he could not hold a thermometer under the tongue without causing spasmodic movements of the jaw that would break the thermometer. Temperatures had, therefore, been taken in the axilla. He had worked as an orderly in an Army hospital in Manila and was sure he had typhoid fever; he called attention to his temperature record, his tympanites, etc. Suspecting the man to be a fraud, I had the temperature taken per rectum. The temperature that under his arm was 103° was found in the bowel to be 99°.4.

The patient was wheeled into the clinic. He was a voluble, willing witness. His temperature chart was put on the blackboard and the tympany shown. Most of the students agreed with the patient that he was suffering from typhoid fever. When I sharply ordered him to relax and get his arched back down on the bed, his tympany vanished. The boys became interested, the patient showed signs of unrest. I whispered to him, "I know you are a fraud. I'll give you a dollar if you'll tell me how you make the thermometer go up." He growled surlily that he was not a fraud. "All right," I whispered, "I'll have to expose you." Turning to the students I announced, "This man is a fraud, a malingerer, in common parlance, a liar, though I can't tell you his technic with the thermometer. He will be discharged from the hospital with that diagnosis." The man sat up in bed and vigorously denounced me as an ignoramus. He was,

he said, a taxpayer; he would claim the right to stay in the hospital as an invalid, would sue me for damages, etc. My only comment was to turn to my intern and instruct him to write the discharge at once.

That evening at dusk I answered my home doorbell and found my patient on the steps. "I've come for the dollar," he said, "I'll show you the trick. Let me have your clinical thermometer. How do you make the mercury go down? You shake it sharply, don't you? Now if you turn it over and shake the other way, the mercury will go up, won't it? That's what I do when the nurse is out of the room. If she stays, under the bedclothes I turn the thermometer that is in the armpit upside down and with my thumb give a few sharp taps on the top—like this—put it back right side up and the nurse finds 101° or 103° or even 105°. Thanks for the dollar, Doc. You were pretty sharp but not quite sharp enough." A few months later I saw in a medical journal from Kansas the report of a remarkable case of hyperthermia. A soldier returned from Manila had been shot in the neck with resulting damage to the heat center; his temperature, etc. How long he was successful in panhandling the Kansas doctors I never knew.

Another case took up the full hour of the clinic. A man was shown with a most severe anemia, the hemoglobin being less than 30 per cent. All the symptoms were there—the weakness, dizziness, palpitation, systolic murmur. One after the other, various diseases suggested by students were eliminated: pernicious anemia, splenic anemia, leukemia, carcinoma, tuberculosis, Bright's disease, ankylostomiasis, tapeworm, and so on. By a little judicious steering I managed to keep the students from getting too close to the correct diagnosis. Toward the end of the hour I announced, "Now you have guessed everything except the commonest cause of anemia; you have thought first of what is rare. You have forgotten that the commonest cause of anemia is hemorrhage, direct loss of blood from a blood vessel. Not one of you has asked whether this man has coughed up blood or has, through accident, broken a varicose vein; not one has raised the question of bleeding from a duodenal ulcer or a

carcinoma of the bowel; not one has thought of a massive hemorrhage from hemorrhoids or of daily small losses from such a condition. Let me show you a picture such as I have never seen before and such as you may not soon see again. The patient is quite willing to give an exhibition, though it is embarrassing to him, because he agrees with me that you should learn a valuable lesson. He will show you what happens nearly every morning. A large dish pan was brought, the patient squatted down with his back to the class and then at my request strained as at stool. There was turned out the largest rosette of piles I ever saw, dripping and spurting blood that, with a little fecal matter, measured several ounces. There was a hush until the scene ended. I thanked the patient for his willingness to give the demonstration and promised him that a comparatively simple surgical operation would restore him to health. The applause that broke out was more for the patient than for me. Every once in a while, for several years, I heard comments about that clinic. A doctor from a western state told me that he happened to be visiting in Chicago that day and casually wandered into my clinic. "Doctor Herrick," he said, "that was the most dramatically instructive clinic I ever attended. The lesson it taught me has been of greatest help to me in practice."

Amusing incidents occasionally occur in clinic, some of which may be turned into instructive lessons. It was my custom to have a student examine a patient for about thirty minutes while I was showing another case to the class. At the end of the half-hour, the student reported his findings and the diagnosis. One day a student announced that from the history and physical examination he was sure the patient had locomotor ataxia. He was correct in his diagnosis, as he demonstrated by the absence of the knee jerk, the Romberg symptom, patches of anesthesia. The patient willingly co-operated in the demonstration. When, however, the student demonstrated the Argyll-Robertson pupil as reacting in accommodation but not to light, the patient burst out laughing. I asked him what the joke was, though I knew. "Why," said the patient, "that's my glass eye!"

One afternoon, pressed for time, I hurried into the ward and asked the intern if he had a good case of aortic regurgitation that I could have for clinic the next day. "Here's just the one you want," he replied, "an absolutely typical case." I felt the pulse, clapped my ear to the chest, said it was exactly what I wished, and asked to have the patient in the clinic the next morning. In the clinic the next day, I asked the student who had spent the half-hour in examining the man what was his diagnosis. He replied "locomotor ataxia." I was surprised, though I tried not to show it as I said, "Well, prove it to us." And the student proved it, the man clearly had tabes and admitted a luetic infection several years before. Then complimenting the student on his diagnosis, I, rather wickedly, pointed out to him that because his attention had been focused on the nervous symptoms he had overlooked a striking heart lesion; that the case illustrated what had been so often preached, that in a relatively young individual the finding of an aortic leak should make one search for tabes or general paresis, that in tabes or paresis one should look out for luetic lesions in the aorta and the aortic valves. The young man was quite chagrined; the lesson was an excellent one for him and for the class. It was also an excellent lesson for my intern, who said, "Dr. Herrick, that's one on me." "And," I added, "on me too."

About 1915, I retired from active work at the County, retaining for a time a position on the consulting staff. Gradually my visits to the hospital became rarer and rarer, and for the last several years I have completely lost touch with it.

My debt to the County Hospital is great. In its day it was *the* hospital for the training of interns and the attending staff. It is still in many respects pre-eminent, though other city hospitals that have increased in size, improved their facilities, and reorganized on an educational basis are decidedly vigorous rivals. If the incubus of politics could be shaken off the County Hospital and if the responsibility for undergraduate and graduate teaching be passed over to the medical schools and to the Chicago Medical Society, it would be a great advance.

CHAPTER VI

In General Practice

Physicians, like pathologists, are made at the bedside.

SIR CLIFFORD ALLBUTT

BEFORE leaving the County Hospital at the end of September, 1889, I had decided to accept an offer from Dr. Charles Warrington Earle to become his assistant. My work was to begin November first. The month of October was left free to permit the carrying-out of a long-contemplated plan. On October tenth, Zellah P. Davies and I were married at her home in Oak Park.

Dr. Earle, then forty-four years of age, was a well-known practitioner on the West Side of Chicago, which still retained much of its earlier reputation as an aristocratic neighborhood, though even then there was an unmistakable trend for those socially prominent and financially prosperous to move to the South or the North Side. Dr. Earle had enlisted young in the Civil War and had become a lieutenant of infantry. He had been wounded at Chickamauga, captured, and sent as a prisoner to Andersonville. He was one of the few who succeeded in escaping from Libby prison through the famous tunnel.

Graduating from Chicago Medical College, now Northwestern University Medical School, he had rapidly picked up an extensive practice. He had been associated with others in organizing a new school of medicine, the College of Physicians and

Surgeons, and had become identified with the Woman's Medical School. He took an active part in medical society affairs. He was known as a live wire, a hustler.

He possessed the qualifications of a good family doctor. He rendered faithful service to his patients. He was honest, never assumed a know-it-all attitude, was ever ready to ask for help from colleagues when it was needed. He was kindly, cheery, even jovial in the sickroom and always inclined toward optimism. Thus he inspired confidence.

By association with him I was taught many lessons that I had not learned in the hospital. One met with slight ailments—headache, simple "colds," sore throats, constipation; became acquainted with the beginnings of disease and with the course of chronic affections like asthma, arthritis, tabetic and other luetic manifestations, various types of "indigestion." There were many cases of contagious disease—measles, scarlet fever, diphtheria. Since there was no contagious hospital at this time, these patients had to be cared for in their homes. There was truth, too, in Dr. Earle's comment that "you hospital fellows may know a lot more about bacteria and the latest operations than some of us older cornfield doctors, but we can teach you men something about how to get along with people in their homes. You can't boss them there as you do in the wards of the County."

One day he asked me to come into his consultation room to see a policeman, Mike Conlon, who thought he had a serious disease of the heart. The doctor gave me a brief history of Mike's symptoms and then said, "Mike, Dr. Herrick knows a lot more about heart disease than I do and I want him to examine you and tell us what he thinks of your case and what he would prescribe." After a careful examination I said I believed the heart was perfectly sound. "Good," said the doctor, "now what medicine would you give him?" When I replied that I wouldn't give any drug; just tell him to forget it, Mike's face flushed red with anger as he blurted out: "Well, young fellow, then I'd go damn quick to somebody who would." Dr. Earle fair-

ly roared with laughter and said, "Of course you would, Mike. So would I, if I were you. I'll give you some medicine that will make you well. We thank Dr. Herrick, though, for assuring us that your heart condition is not serious." When Mike had gone, Dr. Earle said to me—he was immensely tickled over the whole incident—"Dr. Herrick, there are two kinds of people that have to be treated: those who are sick and those who think they are sick."

Dr. Earle was eager to learn. He was never afraid to face the revelation of the post mortem examination even though it might reveal an error in diagnosis. I have never known his equal in the desire for autopsies in private practice and in the ability to obtain the consent of the family to have them made. He learned much in this way. He learned, also, in another way. Realizing that he was not keeping up with the rapid advances in medicine—he was not much of a student of medical literature—he often sought help by calling as consultants colleagues or specialists whom he regarded as better informed on certain subjects than he was. He often invited me to go with him on these occasions, knowing that it would be helpful to me to become acquainted with these men who were prominent in the profession. One of these was William E. Quine, who was his colleague on the faculty of the College of Physicians and Surgeons; they were really chums.

I had never come in close contact with Dr. Quine until I met him at a consultation that is still vivid in my memory. Dr. Quine arrived punctually. He was short, stocky, wiry, just turning gray at forty-three. He was nattily dressed; wore a clerical-like vest that buttoned high in the neck. He was dignified, as though the occasion demanded strict formality. Dr. Earle recited the history of the case; Dr. Quine listened attentively, asked a question or two, and then after a minute of meditation spoke very deliberately, enunciating every syllable with an impressive staccato emphasis: "Earle, that is the rational history of *cryp-to-gen-etic septi-co-py-emia*"—all this accompanied by mildly energetic gestures of the hands and head. Dr.

Earle suggested that, to avoid alarming the patient too much, Dr. Quine go in and examine her alone. When sure that Dr. Quine was out of hearing, Dr. Earle turned to me and said: "What in the world was that awful diagnosis?" I replied "Cryptogenetic septico-pyemia." "What does that mean, Dr. Herrick?" "Simply blood poisoning of obscure origin." "Well, then, why in the dickens doesn't he call it that and be satisfied?"

In the years that followed I met Dr. Quine many times. Our relations were always friendly, though occasionally a few sparks flew, as once when there was a little clash in the matter of local medical politics. He was alert, outspoken, and fearless; a fighter against boss rule or what he regarded as privileged interests in medicine. He was famous for a vigorous, declamatory, crescendo style of didactic lecturing. He caught the point and was amused when, in answer to his query as to where I had first made his acquaintance, I replied that it was one day when, as I was walking by the College of Physicians and Surgeons, I heard him through the open fourth-floor window lecturing on the third week of typhoid fever. He was ever the friend of any student or practitioner of medicine who was honest, diligent, or in need. For several years his three lectures on homeopathy drew audiences that filled the amphitheater. He was a hard hitter against what he thought was sham or selfishness, yet he left few enemies. Many admirers and warm friends mourned his death, which occurred in 1922.

Dr. Earle's remarkable hold on his clientele is shown by the fact that, no matter how much he might praise the ability of his assistant, patients always preferred "the old man." "Of course I knows you'se a awfully busy man," the colored woman protested when he sent a former assistant to make the visit, "but when I calls you, if you cain't come today, why jes' come tomorrow; and if you cain't come tomorrow come de next day, but, doctah, please don't send any of the chilluns."

When the epidemic of influenza—"Russian grippe" it was called—hit Chicago late in 1889, our work increased suddenly

and to an almost overwhelming degree. We were swamped with new calls. The day's tasks ended only when we were unable physically to keep going any longer. One morning when the doctor and I mapped out the work for the day, there were between one hundred and twenty and one hundred and thirty names on the visiting list. We postponed visits on the chronics, the convalescents, and those not seriously ill, calling on as many others as we could. We came in after midnight. Dr. Earle, with his span of horses and a driver, had made sixty calls. I, driving my own single horse and buggy, had made twenty-eight. "The biggest day's work of my life" was Dr. Earle's comment when we compared notes the next morning.

While there were many mild cases of influenza, the manifestations of the disease in this visitation were largely those of a severe infection, with respiratory tract involvement predominating—cough, bronchitis, pneumonia, empyema. Postinfluenzal weakness, neuritis, cardiac irritability, middle-ear infection, and prolonged convalescence were common. There were many deaths.

Reference to the frequency with which fatal cases were encountered recalls an amusing incident. Dr. Earle, meeting a confrere on the street, said to him, "Severe epidemic, isn't it? Have to write a good many death certificates, especially for pneumonia. Sorry that patient of yours whom I attended when you were called out of the city didn't get well." Dr. X replied, "Why! I've been very fortunate so far, I haven't had a single death."

As we drove away, I remarked that this doctor must be unusually competent. What was the secret of his success? "No," said Dr. Earle, "he isn't competent and he doesn't ring true. It is well known among West Side doctors that, when this man sees that a patient is going to die, he has a sudden call out of town or is himself taken ill, or he is so busy that he can't come. So he suggests that the family get someone else. But people are on to him. When things look serious, they drop him. Perhaps you don't realize it, Dr. Herrick, but the best doctors sign the

most death certificates." The truth of this observation has more than once been borne in upon me.

Long before the unwritten contract with Dr. Earle for one year had expired, I had decided to go by myself. The physical strain of the hard work had too often produced a sense of fatigue that was unusual with me. I was worried lest the albuminuria of my intern days might lead to serious trouble. Besides, in addition to being Dr. Earle's helper, I was acting as assistant demonstrator of anatomy at Rush, and this took much of my time in the evenings. I was teaching in the Woman's Medical College. In January, 1890, I had been appointed an attending physician at the County Hospital. I wished for more time to look after these matters; I also desired leisure for study, writing, and relaxation, for attendance at medical society meetings, and for contact with confreres of my own age. I wished to feel free to take my own gait, to plan and carry out my own day's program. In short, I longed for more independence.

So, in the summer of 1890, I announced to the good doctor that I must leave him. He urged me to reconsider; he would offer a substantial increase in salary. I held firm. At last he understood my position more clearly and graciously accepted my resignation. George H. Weaver, who was just finishing his internship at the County Hospital, took my place.

Dr. Earle and I parted the best of friends. Up to the time of his all too early death on November 19, 1893, our relations were most cordial.

On November 1, 1890, I began work as an independent practitioner of medicine. There was a thrill in feeling that I was free and my own master, nobody's "hired man." No longer would the day's program be made out by an employer, nor would orders be issued by an attending man in a hospital. I was as overjoyed as a child when it realizes that it can walk alone.

But there was a good deal of delusion about this. I soon learned that a doctor is under other taskmasters whose demands are most exacting. He is driven by impulses that, though intangible, are yet real. There is ambition that goads him to ef-

fort, so that he may not be outdistanced by rivals in winning the esteem of colleagues and patients or in securing honors in college, hospital, or medical society. There is the necessity of earning enough to provide food, clothing, and a sheltering roof for himself and his family. He desires comforts or even luxuries. Sooner or later he realizes that the most relentless taskmaster of all is the patient. The patient demands that his physician shall have a knowledge of up-to-date medicine and be able to apply it in practice. Moreover, unless the doctor lives up to the ideals of medicine as a profession and not a trade, unless he is sympathetic and humane, ready to sacrifice his own comfort and convenience for the welfare of the patient, he is quietly or brusquely dropped. In a very real sense, then, the doctor is a servant. He has also to reckon with possible bad luck: illness of self or of members of his family, financial reverses, and the like.

In spite of all these requirements, of which I was at first ignorant, I managed to retain a good deal of independence. While my aim was to become ultimately what is today called an "internist," it seemed necessary and desirable for a time to carry on a family practice. I am sure that this was a wise decision. As a rule, the best specialists are those who go into a limited field of work only after a long apprenticeship in general practice. I have never regretted my internship in the County Hospital, my years of service as attending physician in its medical wards, my year with Dr. Earle, or my ten years of family practice from 1890 to 1900.

On November 1, 1890, in cramped quarters in the basement of my home at the northeast corner of California and Warren Avenues, I began to receive office patients. Acute cases such as scalp wounds, foreign bodies in the eye, sore throats, mild gastrointestinal upsets came in. Chronic ailments appeared: sick headaches, constipation, "catarrh," "rheumatism," and what seemed to me an unduly large quota of "female complaints." I made ready for nearly any type of work, though with a rather limited armamentarium. I had instruments for diagnosis and

instruments and dressings for minor surgery. I bought a gynecological table that was capable of doing service as a table for ordinary examination or as a simple chair. I installed a storage battery and cauterized hypertrophied turbinates and snared off nasal polypi With a guillotine-like tonsillotome I cut off the tops of tonsils—the big ones that nearly met in the center of the throat. The thorough exsection of diseased tonsils was then scarcely known. An occasional patient with venereal disease wandered in, though he had such a cool reception that he seldom came back.

In visits to the homes I might meet with scarlet fever, fractured clavicle, an attack of asthma, a paroxysm of rapid heart action, an epileptic convulsion, a cerebral hemorrhage, or a miscarriage. All these I cared for to the best of my ability. I never attempted major surgery.

Practice came to me rather rapidly. I never had the discouraging experience, so often described by others, of a long wait for work. Rarely a day passed that I did not see at least one patient in my office or at his home. With the return of influenza in the winter of 1890–91, the number increased appreciably. Older, overbusy physicians asked me to make calls for them. People unable to get their own physicians ventured to try the new doctor whose big sign had recently appeared. Newcomers into the new and growing neighborhood called on me. Soon I was comfortably busy.

As practice increased, I began gradually to give up treating certain types of disease, though retaining the privilege or duty of diagnosing. The first to be dispensed with was gynecology. This caused me no regret, for this branch of medicine has always been disagreeable to me. Then I stopped treating troubles of the eye, ear, nose, and throat, though I would occasionally puncture an eardrum, lance a peritonsillar abscess, remove a foreign body from the eye, or prescribe a simple eyewash. I still used ophthalmoscope, ear speculum, and laryngoscope as aids to diagnosis.

One day, as I took off the splint that I had put on a nice old

lady of eighty for her Colles' fracture, I was shocked to see the marked deformity of the wrist. It seemed to me huge. The old lady looked at the lump, eyed me, as I thought, rather suspiciously, and quietly remarked that she was too old to care much about looks but she hoped the arm would be useful. Fortunately, it turned out to be useful. Humiliated at such a poor result, I then and there resolved to turn all cases of fracture over to others who were more competent.

Another experience made me give up surgery altogether. With the help of Dr. Weller Van Hook, who furnished most of the instruments and gave the anesthetic, I amputated the leg of a policeman whose ankle had been crushed by the wheels of a streetcar. Mild infection of the stump followed the operation, and the case dragged on for several weeks before recovery. One feature of the case was unique, at least in my experience: the patient was anesthetized three times before the operation was begun. The anesthetic was started about one o'clock in the morning after a long wait until the mother arrived. When she learned that the priest had not been called, we had to stop the ether until the priest came and administered the sacrament. A second anesthesia was interrupted by the arrival of a brother, who insisted that an older doctor be called in; perhaps he would be able to save the leg. So the patrol wagon clanged its way to Western Avenue and at about three o'clock in the morning brought Dr. W. He quickly sized up the situation and, picking a fragment of bone from the wound and showing it to the family, told them that the whole ankle was like that and that amputation was imperative. Then the third anesthesia and the operation followed.

After this unsatisfactory case I put surgery behind me, though for some time, as I half-jokingly said, I reserved the right to operate for phimosis, ingrowing toe-nail, or pneumococcic empyema in children, where a simple incision and the insertion of a catheter between the ribs was nearly always successful.

It was a happy day when I decided that after I had cared for

the nearly thirty women whose names were on my obstetrical engagement list, I would quit that branch of practice. I recall distinctly the last case of childbirth I ever attended, except in the capacity of consultant. The patient was a bright, charming young woman, the daughter of one of our medical school professors. She made me promise that when she sent for me I would respond promptly. Her previous labors had been precipitate and almost painless. In the last one she had not had time to take off her shoes and stockings; it was disgraceful, she felt, to be "so like an animal." The call came one morning about six o'clock. I hurried to her home, which was two miles away. I was met at the door by a medical student, a relative of the family, who roomed in the house. He was only half-dressed, pale, and quite excited. He said he had been called at the same time as I. He had rushed downstairs and had found the baby already born. "Doctor," he said, "you know I have never seen a case of labor and I'm afraid I have made a terrible blunder. I'm sure I tied the umbilical cord too long." I assured him that this was better than to have tied it short; it would be difficult to splice it. If it was too long, however, we could easily correct the error—just cut off a little more. He was greatly relieved: "Why, so we can. I never thought of that!"

I was able to take care of the increasing practice in large measure because I was systematic. The work for each day was carefully planned. I got an early start; the liveryman was to have the horse and buggy at the door at seven-thirty every morning except Sunday. I was punctual at appointments and in keeping office hours, was prompt in responding to calls, and made visits short, with conversation restricted to the matter in hand, the illness, thus eliminating useless gossip. In this way I was able to care for a goodly number of patients and yet find time for study and writing, for work in laboratory or hospital, and for an exchange of views with confreres at medical meetings or at friendly conferences.

Moreover, I aimed to be candid in telling the patient and the family the nature of the illness. This is not always an easy task.

In saying bluntly or even gently, "You have tuberculosis," the doctor may be making a statement that from a strictly medical point of view is correct. He may think he has been honest. His statement may be essentially false, however, if to the patient "tuberculosis" means early death from galloping consumption or a more gradual wasting away that leads inevitably to the same end, while in his particular case the outlook may be decidedly favorable. When speaking to medical groups on this topic, I have often quoted a pertinent statement of Emerson: "It is not the fact that imports but the impression or the effect of the fact on the mind."

Once, my truth-telling plan failed to work. I forgot that patients do not always grasp our meaning because we employ language that they do not understand. I could not convince a man of sixty-five that the trace of albumin in his urine was not of serious significance. On his report from the bureau of analysis was the finger, rubber-stamped in violet ink, pointing to the word "albumin." This outweighed all my reassurances. One day I said: "Why do you not worry about your wrinkles and your gray hair?" "Why, doctor," he said, "am I not entitled to have gray hair at sixty-five?" "You are," I replied, "and so you are to have a trace of albumin in the urine. Your trouble is simply gray hair in the kidney." I saw him no more for two years, when he again came to see me. "You don't remember the circumstances, doctor, but I was upset by your statement. I went to another doctor, who promptly found Bright's disease. When he asked me what your diagnosis had been and I told him 'gray hair in the kidney,' he was indignant and furious. He said he had never heard such a fool diagnosis in all his life." *Haec fabula docet:* Beware of using figurative language in speaking to a patient who is literal-minded.

A rule that helped relieve many a perplexing situation was to make it easy for anyone who desired it to have counsel or to drop me for another who might for any reason be preferred. The way in which some doctors hang onto a case when it is perfectly plain that they are no longer wanted, and the resent-

ment they show when consultation is suggested, seem to me narrow-minded and often unfair to the patient. And, if these doctors only knew it, it is bad policy.

In thinking over these ten busy years of general practice, I note that the cases most firmly fixed in my memory are those in which there was a tragic result of an error in diagnosis; chagrin at having a consultant point out some oversight on my part; or a sudden turn of events that touched off my sense of humor, thus lessening a little the humiliation at some slip I had made. It is true, as has often been said, that one learns—at least one should learn—more by mistakes than by triumphs.

I was called one day to see a young man who had been ill for four or five days. The mother, becoming dissatisfied, had discharged the doctor who had been in attendance and, on the recommendation of a neighbor, had sent for me. I listened to the history and to her strictures on the conduct of the physician who at each visit "just looked at the tongue, felt the pulse, took the temperature, gave a poke in the belly. On the very first day he called the disease typhoid fever." This recital stimulated me to make a thorough examination. Throwing back the bed clothes, I examined the lad—heart, lungs, abdomen, everything, as I thought. Then I told the mother that the first doctor's diagnosis of typhoid fever was probably correct; I wrote out minute directions as to diet, sponging for high temperature, etc. As I was saying goodbye, the patient called out: "Doc, would you mind looking at my leg?" "What about your leg? I examined you from head to foot, didn't I?" "No, only to the knee," he replied. "About a week ago I barked my shin against a truck on which I was wheeling boxes in the freight house and the sore spot seems to be getting bigger." I examined, and there on the leg was a blooming patch of typical erysipelas. I called the mother to look at it and said: "It isn't typhoid, it's erysipelas." "Well, doctor," said the old lady—and she was a lady —"I never believed it was typhoid even when you said it was. As a practical nurse I've seen typhoid. Jack's sickness came on too sudden for that disease, and all along his mind has been too

clear." I tore up my written directions and gave new ones. I went away amused, chagrined, murmuring to myself "slow onset," "mental hebetude," and other stereotyped phrases that were in every textbook description of typhoid fever. Thereafter, when lecturing to students on diagnosis, I often told the story, which always went over with the boys, urging them to remember that when they spoke of an examination "from head to foot" it should not mean from head to the knees, rather from head down to, and including, the toes.

I once told a young man, when I was unable to explain a malaise and fever which he had had for a few days, that, by the exclusion of other diseases, I suspected typhoid, though I frankly admitted that some characteristic features were not present. To be on the safe side he should remain in bed and go on a restricted diet. At a third visit, still perplexed as to the diagnosis, I again examined him as though I had never done so before. As I percussed his chest, I gleefully announced, "I've found it; it's a pleurisy with a small effusion. You've never had typhoid." "Well, doctor, I never thought I had." "Then why did you stick to me?" I asked."Because I saw you were honest and were all the time looking for something else, and I was sure you would find it." His pleurisy, probably of tuberculous origin, cleared up. He remained one of my most loyal and ardent supporters.

One more story about typhoid which concerns treatment rather than diagnosis is too good to be omitted. A Negro widow, who supported herself and two children by taking in washing, fell ill with a moderately severe form of the disease. She would not go to the hospital and had no nurse, her only helper being a friendly neighbor who occasionally came in to be of service. As I called one day, I asked: "Martha, you're following directions, keeping in bed, taking only liquid foods and all that?" She looked rather quizzically at me as she rolled her eyes and replied, "Now, doctor, I'm following directions the best I can. But yesterday I did get up and iron a few things for some of my people. And I baked a little cake for the children because they

were crying for it. And, doctor, about that milk diet"—here she chuckled—"when the children came in with some peanuts, I was so hungry and the peanuts smelled so good, I just couldn't help it, I ate nearly a whole bag full, and, cross my heart, doctor, those peanuts surely did me a powerful lot o' good." It must be remembered that in the nineties we were keeping our typhoid fever patients on a diet that was almost entirely of fluids. My experience with the colored woman led me to accept readily the more liberal, higher-caloried one that later was advocated to replace the starvation diet that was so long the vogue.

Another error: A busy, self-important doctor telephoned me that he was recommending me to a Mrs. V., whom he described as "the most disagreeable patient I have ever treated. She is nervous, fussy, has hysterical attacks in which she thinks she will die. I hurry to the house only to find that her spell has ended." I thanked him as graciously as I could for turning over to me his "most disagreeable patient."

A call soon came. I responded promptly, but by the time I reached the house the attack was over. The description of the illness that had been given me caused me to look for "nervousness" or hysteria. After listening patiently to her story and examining her with care, I assured her that there was no serious disease; her recovery depended on herself; after a day or two in bed she was to get up and gradually increase her activities. I explained to her husband the nature of the trouble. Firmness on his part, as on mine, was necessary; we should not be too sympathetic. My talk was along the line of what I thought was a practical common-sense method of handling a psychoneurotic patient.

The next day as I sat by the bedside, speaking encouragingly, telling her that her color was good, her pulse regular and not at all fast, she suddenly cried out as she grasped my arm, "Oh, doctor, it's coming; please, please help me!" A few seconds later I was as scared as I have ever been at the bedside. The whites of her eyes rolled up, her face became purplish, and she had a ter-

rific general convulsion. I feared she would die. For a time I could feel no pulse. When, to my intense relief, she came to, I went into the husband's study, made an abject recantation of my statement as to a functional psychoneurosis. The trouble was plainly serious. I asked for aid from a neurologist.

Both the consultant, Hugh T. Patrick, and I were young, medically. We agreed that we did not know the true nature of the condition. Patrick was sure there was no brain tumor, he doubted its being genuine epilepsy. He dimly recalled having recently read somewhere of attacks similar to those of my patient and in which, as in her case, the pulse before the attacks had been slow. Whether he gave me the direct reference to Huchard I do not remember. But in that author's *Maladies du cœur* I found a description of what Huchard called "cardio-cerebral-arteriosclerosis" with epileptiform attacks. That was my first recognition, as it was Patrick's, of what is known today as the Stokes-Adams syndrome. The patient lived for a few months, dying in one of the attacks under the care of another physician, who replaced me after the husband courteously asked me to retire.

After three or four years I began to realize that I was attempting to do too much. In addition to caring for a steadily increasing number of patients, I was trying to keep up with the times by reading and study; I was writing papers. Foolishly I accepted offers of positions in hospitals. Because of sheer inability to cover all this ground and a growing consciousness that I was spreading myself out too thin, I began to curtail activities. Besides restricting my practice to internal medicine, I gave up some hospital positions and refused to make calls at a great distance.

My strenuous activities were noticed by my neighbors. A near-by colleague once in a friendly way cautioned me against trying to do so much.

One morning at about eleven o'clock, as I came out of my house and was getting into my buggy, portly, dignified Dr. W. came along, carrying his physician's bag. He was moving slow-

ly and ponderously, as was his wont. "Getting started, I see," he greeted me. "Yes," I replied, "getting a *second* start." I explained that I had left the house at seven-thirty, had lectured at the Woman's Medical School from eight to nine, stopping on the way to the school to call on a very ill patient. From nine to ten-thirty I had made rounds in the County Hospital. On my way back from the County I had called on two old patients, and I was now going to see a new case in the neighborhood and hoped to be back in thirty minutes to keep my office hour. The doctor was surprised. Then in a fatherly manner he said: "Dr. Herrick, I'm older than you and can give you advice. Profit by my example. I get up at eight, breakfast, read the morning paper from the first page clear through to the death notices. I see any patient that may come in—I keep no regular office hours—and then about eleven start out to make calls. I don't believe in hurrying. I am back at half-past twelve, have my lunch, take a nap, and at about three am ready for anything that may turn up." Well, I was not built on his model and was not in the least tempted to imitate him.

The character of my work during the decade 1890–1900 may serve to show some features of medical practice in Chicago of the late nineties.

Before the advent of antitoxin, cases of diphtheria often put to a severe test the hold which a doctor had on the family. The empirical treatment which was then in vogue was generally so patently futile that faith in the family doctor might be strained to the breaking point. In the case of an attractive seven-year-old child in whom the disease had invaded the larynx, I had inserted an O'Dwyer intubation tube. (Dr. Wittwer and I had learned and practiced the technic in the morgue of the County Hospital.) This gave relief for several hours; then it was evident that the tube was becoming clogged. The parents begged me not to let the child strangle. I explained the desperate nature of the trouble, the extreme weakness of the circulation due to the toxemia, and the danger of even mild manipulative treatment.

They understood. The mother left the room, the father took the child in his arms, and with little difficulty the tube was removed. As the father uttered a "Thank God," the child gave a feeble gasp and was gone. In memory I can still see the room, the exact location of the bed, the chair, the limp child in the father's lap, the adjustment of the light. I was much upset by the tragic and pathetic end. My emotions nearly got the better of me as the parents expressed their deep gratitude to me for an effort that had failed. Such words in a measure balance the harsh criticism that we sometimes receive for unfortunate results for which we are in no sense to blame.

About 1895 or 1896 my experience with my first case of diphtheria treated with diphtheria antitoxin made me a firm believer in the specific nature of that form of treatment. When, therefore, Dan White, the neighborhood lamplighter—the street lamps were lighted by gas in those days—called me to see his child who had a frank diphtheria, I announced that antitoxin must be given. Dan protested that I had treated his family before and my medicine was "every damn bit as good as this newfangled stuff." When I answered him that I had tried it—though not telling him my experience was with only one case—he wanted to know the result. I assured him it was favorable. Had I seen the report of the death of the Brooklyn doctor's child? said Dan. Yes, I had, but that made no difference. The remedy was to be used here, or he would have to get another doctor. Finally, "Well, go ahead, but I'll blow the roof off the shanty if things don't go right." Well, things went right. I gave the sick lad his dose. Dan thought I was rubbing it in when I gave prophylactic doses to him, his wife, and the other children. Within forty-eight hours the father was radiant. "Mike, the young spalpeen, is sittin' up in bed hollering for something to eat, while young Dan, who's a skeleton and who has been sick two weeks and under Dr. ———, is cross-eyed and can't swallow right; the water comes back through his nose!" The father would not listen to my statement that it was not the drugs given by the other doctor but the disease itself that was

responsible for the postdiphtheric paralysis. I never had a better advertising agent than Dan White, who sang my praises and who told with great gusto how he had "very nearly kicked Doc Herrick out of the house, I was that mad."

Soon doctors of the neighborhood began to send for me to see their patients with diphtheria and to use for them the new remedy, with which they were not familiar. Dr. C. was so enthusiastic over the result in the first case to which he had called me that a few days later he asked me to see another patient. The same procedure was followed as in the first case. As the doctor learned that all there was to it was "just shoot 10 cc. into the kid," he decided to buy one of the syringes, do the injecting himself, and put the ten dollars in his own pocket. He evidently did this, for he called me to only one other case, which was several weeks later. This patient was a boy of about eight years with severe involvement of the larynx. The devout Catholic mother had refused to permit the doctor to use the antitoxin: If it was the Lord's will that Dennis should die, she was satisfied, she said. There was to be no operation, no intubation or tracheotomy; no injection was to be allowed. We pleaded with her in vain. As we were leaving the house, the doctor turned to the woman and, with a face white with anger, shook his fist at her and said: "I'm as good a Catholic as you are. If I had a boy with the trouble Dennis has, I'd gnaw a hole in his windpipe with my teeth before I'd let him strangle to death. May God forgive you for your ignorance." It was one of the most eloquently impassioned appeals I ever heard. The mother did not yield. Dennis died that night.

I believe I was fairly successful as a family doctor, though, as I look back, it is plain that during this period the old type of family doctor was rapidly disappearing and a new general practitioner, the family adviser, was developing.

Much can be said in favor of the older type. In the rural town he was as much an institution as the keeper of the general store, the schoolmaster, or the parson. He was the guide, philosopher, and friend of the inhabitants for miles around. Many of these

men—keen observers, self-reliant, dependable in emergencies—deserve all the praise given by Ian Maclaren to Dr. William Maclure. One of these doctors whom I met later when I was engaged in consultation was of this type. He and I were about to leave the patient's home after having told the members of the family that the aged mother was seriously—we feared fatally—ill. "But," the doctor cheerfully added, "we've crawled out of some pretty small holes in the thirty-five years I have cared for you, and we'll try to come out ahead this time." Suddenly the youngest daughter threw her arms about his neck, kissed him on the cheek, and said, "Oh, you dear, good man, how we all love you!" There was a hushed murmur of approval from the others. It was all genuine, spontaneous, impulsive. As the doctor and I were walking to the buggy, I noticed that his eyes were moist. He met my reference to the tribute to his long service with the feeble remonstrance, "Oh, I brought R. into the world thirty years ago, and her baby a year ago. She's rather sentimental, you know."

Some old-time general practitioners were none too honest; some were not well informed but did not know it; some were of mediocre ability or lacked good judgment. There were faddists among them. However, it ill becomes us of later decades to assume an air of superiority and criticize too freely these old-timers. There are too many among us today who are commercial; some are poorly informed; some stubbornly stick to old, outmoded beliefs or, going to the opposite extreme, thoughtlessly take up with the latest notion, senseless though it may be, merely because it is new. There was a good deal of human nature in the doctor of former times; there is much in the doctor of today; there will be much in the physician of the future.

As I look back and recall the years that I have just described, I am sure no better date could have been chosen for my medical birth than 1885. The next few decades were packed with epoch-making events—the development of bacteriology; the discovery

of x-rays; the invention of instruments of precision; the birth of allergy; the growing importance of biologic chemistry and physiology; a more scientific view of public health; the clearer recognition of the interrelation between medicine and cognate sciences like physics and zoölogy; new standards for medical schools and hospitals; the evolution of specialism and group practice; the endowment of institutes of research; the improvement in the quality of medical journals; the rapid growth in size and power of the American Medical Association, with its influence so great as to seem at times unmanageable or even alarming. The mere listing of these high spots makes one realize into what a whirl of excitement a red-blooded youth of twenty-four entered at this era; how he eagerly opened the medical journals to see what discovery the week had brought forth and what new doctrine had been advanced; how he conferred with confreres of his own age and planned with them in what way they might act so as to contribute, even modestly, to the new science and art of medicine.

Those who are young today cannot understand the thrill that came as, in rapid succession, there were announced as fresh discoveries facts that are now accepted as proved beyond dispute —the germs of suppuration, the Widal test for typhoid fever, the transmission of malaria by the mosquito. And the fun of watching the dance of the pigment granules in the plasmodium of malaria! The joy that came from identifying for one's self the tubercle bacillus! I have already told how, about 1896, Behring's diphtheria antitoxin became available in Chicago, and there was disclosed before one's eyes the miracle that followed as one injected the new remedy and watched results. As I recall it, Edwin J. Kuh was the first to use diphtheria antitoxin in Chicago. The late Walter S. Christopher used to tell me that I was the second. Perhaps Isaac Abt was ahead of both of us. That first case of mine was proof positive for me. What about controls? There had been scores of controls in the cases formerly treated empirically with always the spreading membrane, always the fetor, the enlarged glands, the anemia, the fever, the

slow convalescence; often the paralysis; or the all too frequent death from exhaustion, laryngeal suffocation, or sudden collapse.

With knowledge of the cause of infections, preventive and active treatment were put on a scientific basis with astounding results. Typhoid fever became rarer and rarer until now it has almost vanished. The fight to control tuberculosis and syphilis began and is not yet ended.

Another notable change was the invention of what are often called instruments or methods of precision useful in diagnosis or treatment. In March, 1896, at a crowded meeting of the Chicago Medical Society, there were exhibited by Dr. James Burry, for the first time in this city, prints made from x-ray plates that showed the bones of the hand and leg and a few coins and keys in a pocketbook. So crude were these prints that many in the audience were skeptical as to the importance to medicine of the discovery of the Würzburg physicist, Roentgen, two months before. Two far-seeing speakers, however, predicted great things—one, Archibald Church, reminding us that modern photography started from small beginnings by Daguerre; the other, Nicholas Senn, stating his belief that some day even stones in the kidney or gall bladder might be shown. With a prophetic and broader vision than he is often given credit for, Senn said he feared, however, that the ease and accuracy of diagnosis that might be possible by the use of this new agent would tend to make medical students and practitioners depend too much upon it and thus lose their skill in, and forget the importance of, physical diagnosis. This skill, he felt, should always be retained.

One by one, other instruments and methods of precision have been added to the list. There is the electrocardiograph, the cystoscope, the bronchoscope. Blood pressure and basal metabolic rates are now determined instrumentally with reasonable accuracy. Local anesthesia and asepsis make biopsy or exploratory operation a comparatively simple procedure. One may even class the rubber glove as a device of precision, as it en-

courages digital examinations that formerly were often omitted because disagreeable alike to physician and to patient. And it is no exaggeration to place among the helpful instruments the humble needle and syringe, by which the presence or nature of fluid accumulations may be determined. And what a change has been wrought in laboratory and bedside work by the simple withdrawal of blood from the vein! The blood is studied for bacteria, for its chemical content, for its physical properties, for its revelation of syphilitic taint, for its suitability for transfusions. By the syringe, remedial agents may be injected directly into the blood stream.

Then there is endocrinology, the knowledge of the glands of internal secretion, and, closely related and in an overlapping territory, certain nutritional and dietary subjects. I recall the glow of pleasure with which in 1896 I recognized my first case of cretinism and saw the prompt response to treatment by thyroid gland extract. Highly keyed up, at an alumni clinic I showed the patient, with photographs taken before and after treatment. Enthusiastically I contrasted myxedema and exophthalmic goiter, drawing general conclusions that were perhaps hardly warranted by knowledge of that day or even of the present.

At that time all these things were novel for the physician; they were quite unknown to his patient. Yet, *mirabile dictu*, today the layman talks of the proper dosage of thyroid extract or of insulin; of the best way of carrying out liver therapy in anemia; of calories, vitamins, and hormones, blood banks or sulfa drugs or penicillin—talks of it all as casually as fifty years ago housewives discussed the comparative merits of castor oil or Epsom salts or the best way of bringing to a head a boil on the neck, whether by flaxseed poultice or by simple hot fomentations.

CHAPTER VII

Study Abroad

In the wards with Louis in Paris I learned not to take authority when I can have facts; not to guess when I can know; not to think a man must take physic because he is sick.

DR. OLIVER WENDELL HOLMES

IN THE year 1894 I was attacked by the fever that was prevalent in the nineties and that induced young doctors to go to Europe for postgraduate work. By going there I would gain in factual knowledge and would learn at first hand of the methods of study, teaching, and research that had made German medicine supreme. While Vienna was the Mecca to which the graduates flocked, I decided to go to Prague. My choice was determined almost by chance. One day in Dr. Norman Bridge's office I saw a new book on diagnosis by Professor Rudolf von Jaksch, of Prague. The volume was well gotten up, with fine illustrations. It contained an epitome of the latest facts concerning clinical diagnosis especially by the aid of bacteriology, microscopy, and chemistry. It made a strong appeal to me, fitting in with my leaning toward diagnosis. I learned that at Prague there was a competent pathologist, Hans Chiari, who, Dr. Senn assured me, was a "steam engine for work." Consequently, with letters to Chiari and Von Jaksch from Dr. Senn and from Dr. Carl Beck, who had been a student at Prague and

knew Von Jaksch and Chiari, our little family of three sailed from New York on the North German Lloyd's crack steamer "Havel," bound for Prague via Bremen and Berlin. I had insisted that Mrs. Herrick should accompany me, and she had consented on condition that our daughter, then two and a half years old, be taken with us.

This was our maiden trip to Europe. The memory of the experiences on the journey to Prague, of our three months' stay in that city, and of the return trip is still vivid. Many details are called to mind by rereading old letters, notebooks, and other memoranda. We made six later trips to Europe, but none lingers more fondly in my memory than this first one.

Fellow-passengers on the steamer were Mr. and Mrs. Rudyard Kipling, with their daughter Josephine. Kipling's nursemaid was seasick nearly all the way over, and little Josephine had to be cared for by her parents. So it fell out that occasionally Kipling and I met as we were walking with our daughters, who were of the same age. The children played together and had good times. Kipling was very approachable. When I told him that Helen enjoyed having the *Jungle Books* read to her and was captivated by Rikki-Tikki-Tavi, he remarked, "Ah, the youngest of my audience." He was lionized on the boat, took it good-naturedly, and told some capital stories in the smoking-room. One day Mrs. Kipling was seen rushing back from the writing-desk with some paper which she hurriedly handed to her husband; Ruddy had had an inspiration and must get it down at once lest he forget. When, later, Kipling and Josephine were ill with pneumonia in New York, we followed the reports eagerly, feeling almost a personal loss when Josephine died.

The first evening in Berlin I ran across Dr. J. B. Murphy at the theater. The next day he and I visited Von Bergmann's clinic at the Charité. In the absence of the chief, an assistant very courteously showed us through the wards. We noticed that above certain beds was a sign, reading "not to be examined." In these beds were patients with "perityphlitis," who were being treated by rest, icebag, and restricted diet. I recall the sur-

prise of the assistant when Dr. Murphy, shaking his finger at him, said emphatically in his rasping voice: "In a short time even you Germans will be operating on these cases of appendicitis." The assistant good-naturedly said, "Oh! you Americans, always radical, always in a hurry."

We made the trip to Prague by daylight. It was all new to us: the line of hotel employees wishing us goodbye with hands ready for the expected tip; the railway carriages of three classes, and the small compartments, the customs examinations; the strict enforcement of rules. As we approached Prague in the late afternoon, the road following the winding course of the Moldau through the valley, which was one mass of cherry blossoms, our expressions of wonder and pleasure gave place to a silence that was more eloquent than words—we were entranced by the charm and beauty of it all.

The next day I interviewed Von Jaksch and Chiari. Von Jaksch was restless, nervous, jerky, and tactless. I tried in broken German to tell him my desire to study clinical diagnosis and how his book had induced me to come to him. He cut me short: "Ah! I will have you do an *Arbeit* on the *Stickstoff* in the blood." Then, to his first assistant, "Take the doctor into the darkroom and show him the spectroscope and explain its use in estimating sugar." I was bewildered, couldn't remember whether *Stickstoff* was oxygen or nitrogen. I was repelled by the servile, slovenly assistant, on whose dirty collar a bedbug was crawling toward a dirtier neck. The demonstration in the darkroom was anything but clarifying. Had Von Jaksch taken more time, he might have grasped my needs and wishes better. As it was, I attended many of his clinics, but an *Arbeit* was never again referred to. He did me one good turn, however, "Typhoid fever is raging in Prague," he said, "our wards are full of cases. Under no circumstances should you drink the city water unless it is boiled. Drink beer or charged bottled water." We followed his advice, which may be why we escaped the disease.

My reception by Chiari was quite different. With a cordial handshake, he invited me into his private office, bade me sit

down, read the notes of introduction carefully, inquired about Chicago doctors, and then asked what type of work I wished to do. After a few days we would talk things over again, and I could decide about an *Arbeit*. He put me at ease. In spite of my broken German and his halting English, we understood each other. I was his devoted follower from that moment.

Chiari, though always gentlemanly, was a czar in his department, insisting upon promptness, serious study, and fulfilment of any assigned duty however small it might be. His forte was gross, rather than microscopic, pathology. His museum, which contained 5,000 beautifully mounted specimens, was his pride.

There was a well-authenticated story that once the great Rudolf Virchow, when in Prague, had called upon Chiari, whom, by the way, he did not rate very high—he was reported to have said that Chiari had left a "few scientific flyspecks on the pages of pathology." The distinguished visitor manifested but indifferent interest as he hurriedly glanced at the lecture-room, the dead-house, the students' laboratories, and the research workrooms. Then he and Chiari entered the museum. When after two hours they came out of the room, the assistants, who had all this time been kept waiting outside, noted with surprise that Virchow's manner had changed: he was cordial, and they heard words like *merkwürdig*, *tadellos*, as, with a friendly handclasp, goodbyes were said. The museum had been given a high mark of approval by the greatest authority on pathologic anatomy of the time.

An outline of the work in pathology may serve to show why young American graduates went to Vienna, Prague, and German universities. No such opportunity was offered at that time in any medical school in this country.

From 8:00 to 11:00 A.M., autopsies, on the average five or six a day, were made by Chiari or his assistants. These I was free to witness. At eleven o'clock, the professor reviewed the cases with the assistants; interested students could attend. Specimens that he desired for his museum or for further teaching purposes were saved. The anatomic diagnosis was recorded,

a copy of which was always returned to the attending man under whose observation the patient had died. Mistakes in diagnosis were freely commented upon; errors in technic of the necropsy were pointed out. The assistant who pleaded that he didn't understand just how to proceed, since he had never encountered such a condition before, was caustically reminded that, as he had often been told, all that was necessary was to rap on the chief's door and ask for advice and it would be given. At twelve o'clock came the didactic lecture. In the afternoon there were, twice a week, student classes in microscopic diagnosis. Research went on at all hours, especially in the afternoon. All this had a direct bearing on what I was looking for—clinical diagnosis. I attempted no real *Arbeit*, though, when I told Chiari that cardiovascular disease was especially interesting to me, he never failed to call my attention to unusual gross anatomic specimens illustrating this subject and kept me well supplied with bits of tissue for microscopic study, on which I was expected to report to him my findings, which he always confirmed or rejected after personal inspection of the stained specimen. This was his rule, even with his oldest and best-trained assistants. He made himself personally responsible for reports that went out from the Institute over his signature.

I worked on other than cardiovascular conditions. One day Chiari was called to Teplitz, a few miles north of Prague, to investigate an outbreak of trichinosis. He took with him an assistant.They came back with pails and bottles containing samples of pork from the butcher-shops and pieces of muscle from the bodies of patients who had died. They had made bacteriologic cultures, also. For a week the whole laboratory—Chiari, his three assistants, all helpers, and even research men—were at work on these cases. To me was assigned the examination of some sausage, together with certain muscles from one of the patients. There were serial sections galore, various stains, etc. I recall the elation with which I showed the chief what I thought was a nest of trichinae. "Ah, come into the office." He took down a volume of Leuckhart, turned over a few pages, and then

said, his eyes twinkling, "Schauen Sie mal an, Herr Kollege." There was a figure that exactly resembled my supposed trichinae. Its legend was "Miesersche Schlaüche." Then he explained to me what was known about the strange condition that Miescher had discovered in the muscle of the house mouse. It was not trichinous. Later, however, I ran onto many nests of young trichinae in the muscles. The zeal and thoroughness with which this evidence was worked up, the emphatic way in which he laid down the rules by which the disease was to be stamped out in Teplitz, the accurate and thorough method by which it was studied, revealed the energetic nature of this true scientist. When his bacteriological assistant, Zörkendörfer, detected as a secondary invader a bacillus identified as anthrax, a report on the occurrence was deemed worthy of being the basis for an article which was published in 1894 in *Zeitschrift für Heilkunde.*

I worked on a case of actinomycosis of the middle ear that came to autopsy. Professor Chiari thought the primary focus might have been in the tonsil, and hence he set me to work making serial sections of the tonsil to see whether evidence of an old actinomycotic lesion might be found. Every day Professor Zaufal, whose case it was, came to my desk to see if I had found relics of old disease in the tonsil. He was delighted when no evidence of primary disease in the tonsil was found. He was hoping to be able to report it as a case of primary actinomycosis of the internal ear, which I believe he did.

What was called a "klinische Section" was always of special interest and particularly instructive. This was a necropsy on the body of a patient who had been shown in a clinic. The examination was made by Chiari himself, the professor who had shown the case in clinic being present. Generally a goodly number of students attended. The procedure was dignified and formal: "Die Ehre, Herr Kollege! Bitte um Diagnose." The professor gave his diagnosis. Then came the revelations of the autopsy. Smiles of satisfaction and congratulations followed an accurate diagnosis. There were disappointment and chagrin when it was shown that a wrong diagnosis had been made

through carelessness, faulty clinical technic, or poor reasoning. Some professors took these mistakes seriously, saying they had learned a lesson. Some were irritated and inclined to be resentful at the pathologist, or they laid the blame on their assistants. Some were good-natured about it. Gussenbauer had operated on a woman with a huge lobulated fibromyoma of the uterus. He had, as he supposed, separated a large lobe of the tumor from the liver, to which he believed it was adherent. The patient had died of pulmonary embolism. When Chiari showed that the surgeon had merely separated off from the larger uterine mass a good-sized lobe that had not been adherent to the liver and that this mass had been left free in the abdominal cavity, the little man threw up both hands and good-naturedly exclaimed, "Ach Gott!" He had a sense of humor, this was just a big joke on him. Incidentally, a few days later, Gussenbauer left for Vienna as the successor of Billroth.

The pathologist has the last word; so, if he desires, he can make it uncomfortable for the attending man as he shows up his error, or he can let him down easy. Evidently Chiari took delight in bearing down hard on the Von Jaksch clinic. When Von Jaksch's diagnosis of uremia as the cause of death due to an exacerbation of a chronic nephritis was shown to be really due to a purulent meningitis, Chiari let Von Jaksch walk right into the trap, leading him on to explain the delirium, coma, etc., on the basis of uremia diagnosed by blood and urine examinations. Chiari knew what the meningeal findings were, for the *Diener* who had removed the skull cap had whispered to him "suppurative meningitis." As the cerebral symptoms were so striking a feature, Chiari said he would begin by examining the brain. "Ah," as the pus dripped to the floor, "I have never seen a more marked case of suppurative meningitis." Von Jaksch looked crestfallen and indignant; but he had no comeback. The students enjoyed all this, for Von Jaksch was none too popular.

On another occasion when Professor Přibram had diagnosed typhoid fever and the *Diener* had whispered "tuberculous

meningitis," Chiari, with a hint that was not lost on his colleague, to whom he was partial, commented that, of course, he had thought of other conditions that might resemble typhoid, like general septicemia or miliary tuberculosis, though naturally with so much enteric fever in the city that would be his first thought. Přibram was quick to hedge and said, "Oh yes, it might be tuberculosis because there was dyspnea, etc." And when the miliary tuberculosis was shown, Chiari came close to congratulating him on his accurate diagnosis. One may well comment that there is a good deal of human nature in medical professors in all lands.

That there was rivalry between Von Jaksch and Přibram, possibly with some jealousy, was generally known. Students took sides, one group arguing that Von Jaksch was more scientific and better informed as to bacteriology, clinical chemistry, and microscopy. The other group, larger numerically, praised Přibram as the more practical, the better diagnostician and therapist. While I was there, each one of these clinicians put on a show clinic that was advertised by announcements in advance. Přibram exhibited a remarkable case of myositis ossificans before a crowded amphitheater. A few days later Von Jaksch's room was packed to the doors as, in a way that would have done credit to Charcot, he presented a patient with major hysteria. I really felt that Von Jaksch "put it over" on Přibram. Perhaps I was influenced a little in reaching this conclusion because, while attending Přibram's clinic, which was held on a cold rainy day, some rascal stole my overcoat and a new umbrella I had hung in the hall. According to an old saying, a Bohemian is either a musician or a thief. I had realized that in Prague, the city of Smetana and Dvořák, there were musicians; I now knew there were also thieves.

At times, Chiari's autocratic attitude reached over into the clinical departments of the university. Just how much authority was granted him by the government and how much he assumed I do not know. He had much to do with "coroner's cases," in which his decision as to the cause of death might have

definite medicolegal bearing. What interested me particularly was to note how he never hesitated to criticize mistakes made by clinicians, when death had resulted through avoidable error. If he was convinced that these errors had been made because of ignorance or carelessness or through an excessive zeal in experimental therapy, he warned the offenders and, for a repetition of the offense, called them down, often before the class. He informed the Foundlings Hospital—I am sure it was not Rosthorn's obstetrical department—that altogether too many fractures had been found, the result of faulty instrumental deliveries. On another occasion, too many newborn infants had come to him whose death was due to infection through the umbilicus; improved asepsis must immediately be instituted, or the authorities would be notified. Such warnings as these, carrying with them the possibility of criminal proceedings, did not go unheeded.

I recall also how one day, when in the blood-filled stomach of a patient from Von Jaksch's ward he discovered a linear tear that extended through the mucosal and muscular layers of the wall to the peritoneum, he inquired of Jaksch's assistant who had charge of the case, about the symptoms, methods of diagnosis, treatment, and manner of death, which apparently was from gastric hemorrhage. The assistant described how, in order to determine certain facts about the stomach such as its size, contour, patency of the pylorus, he had dilated the viscus by passing a stomach tube and forcibly pumping in air. Yes, the patient had vomited a good deal of blood, which tended to corroborate the suspicion of carcinoma. When the stupid and unsuspecting assistant had finished, Chiari turned on him: "This is the last time I shall speak to you on this subject. Twice before, these linear tears have been found in your patients, and I warned you about the danger of forcibly overdistending the stomach. The fact that the patient had carcinoma, which would ultimately have caused death, and that a complete rupture of the stomach did not occur does not excuse you from being guilty of malpractice. I shall report to your chief, who can punish you

as he sees fit. But if one more instance of this kind comes to me, you will be reported to the government authorities." It was rough treatment, but all who heard the tongue-lashing felt that the young man's incompetence deserved the severe censure.

At this time the faculty in the German medical department of the University of Prague was a stong one. Rabl in anatomy had a fine museum of normal anatomy, a fitting companion to Chiari's in pathology. There were Hering in physiology, Huppert in chemistry, Hüppe in bacteriology, Gussenbauer in surgery, Rosthorn in gynecology and obstetrics, Ganghofner and Epstein in pediatrics. Three Picks in the faculty were known to the students as "Nerven Pick," "Haut Pick," and "Friedel Pick." Přibram was the head of the first medical clinic, housed in a new and well-equipped building. Von Jaksch was in charge of the second medical clinic, working in poor quarters, though later he was given a new building.

I took the opportunity of meeting several of these men. I heard Ganghofner give a clinic on diphtheria in which he emphasized the importance of bacteriologic diagnosis and early intubation for laryngeal involvement. Active and protective use of antitoxin was not then known. The neurologist Pick, who was highly regarded by his colleagues and students, gave a wonderfully instructive clinic on general paresis, dramatically exhibiting a convulsive seizure to his class. I met Gussenbauer and Rosthorn, though I never went to their clinics. Both were soon called to Vienna. Why Chiari never occupied the chair of pathology in Vienna I do not know. Some of his assistants, like Maresch, went to Vienna, and his son, much later, became a well-known pathologist there.

My stay in Prague was made unusually pleasant because of the presence in Chiari's laboratory of four Canadians from Montreal—A. D. Blackader, Charles F. Martin, Frederick Finley, and Dr. McCarthy. Martin and Finley were interested primarily in internal medicine, Blackader in pediatrics, and McCarthy in anatomy. Because we were the only English-speaking students in the school, we became well acquainted and had good times together.

One episode is worth recording. The four Canadians and I clubbed together and engaged Friedel Pick, who was an assistant in Přibram's clinic, to give us ward demonstrations in internal medicine. What was our astonishment at our first meeting to have Dr. Pick try to teach us in English. His attempts to use the language were ludicrous. One such lesson was enough. We decided that Dr. Blackader as the oldest of our group should tell Dr. Pick that we wished him to use German in his teaching. Dr. Blackader used perfectly awful German, but Pick got the meaning. He was angered and went at us with a vicious, rapid fire of German that showed how upset he was. He got over his peeve, however, and we had a fairly satisfactory course with him. Pick, by the way, was the one who later (1896) became known for his pericarditic pseudo-cirrhosis of the liver, often spoken of as "Pick's disease."

About the middle of July, school work ended and vacations began. We started for home. I felt that my three months in Prague had been profitable, though I have sometimes wondered whether I would have done better to go to Vienna, Munich, or Berlin.*

We left Prague with regret. We had been well cared for by Fräulein Finger in her pension at 4 Thorgasse at the corner directly opposite the fine Bohemian Museum. We had thoroughly enjoyed our stay in the old Czech city of 300,000, which still retained the charm of the Middle Ages and was rich in the tradition of its great men like Hus, Tycho Brahe, and Wallenstein. On holidays and Sundays, we had spent many an hour wandering through the narrow crooked streets lined with small old shops, perhaps taking a short cut through a "Durchhaus." We had explored the Teynkirche, the Hřadschin, the Wyschrad, and the old Karlsbrücke with its statue of the patron saint, John of Nepomuc. We had occasionally lunched at the Belvedere, with its fine view of the Moldau Valley. We had made a short excursion to the historic battlefield of the White Mountain, a

*Further details, especially medical, concerning our stay in Prague are to be found in four letters in the *Journal of the American Medical Association* for 1894, which were written at the request of the editor, Dr. John B. Hamilton.

few miles west of the city, and a longer *Ausflug* to Dresden and the Saxon Switzerland. We enjoyed the German theater and the music at the Bohemian Opera House. We were never able to conceal the fact that we were Americans, for our dress, our actions, and our accent betrayed us. One day as we were looking for the entrance to the old Jewish cemetery—it was hard to find, as Baedeker said—in my best German I asked a young man whom we met if he could tell me the shortest way there. He promptly gave me the directions in correct English, though with a little Czechish accent. When I asked where he got his English and how did he know we were Americans, he said, "Oh, I spotted you half a block away as Americans. I worked in New York for eight years."

The return trip combined sightseeing with several visits on my part to medical clinics. I was especially eager to see Adolf von Strumpell, the head of the medical clinic at Erlangen. So, after stopping a day at Carlsbad, I took an early train one morning and made a pleasant one-day pilgrimage of twenty miles out from Nuremburg to the little city of Erlangen.

I wished to see Strümpell because I had studied with interest and profit his *Textbook on Practice*, the first translation of which into English had been made (1886) by Vickery and Knapp, of Harvard. It was plain that the author was a man of culture, well grounded in the facts of medicine and cognate sciences, familiar with the history of the past and the knowledge of the day—one who could think logically and write clearly; who did not clutter up his pages with nonessentials. He knew the needs of the undergraduate and the young practitioner.

After attending his clinical lecture, I made myself known—I had no letter of introduction—and was most cordially and with no signs of condescension invited to make rounds with him. He was jocular when he saw me pull from my pocket a binaural stethoscope; took good-naturedly my facetious attempt at a comeback defense as against the monaural instrument. He seemed pleased, perhaps a little surprised, when he found that I could use an ophthalmoscope and discuss intelligently with him the retinal findings. Though eight years my

senior, he treated me as a colleague. After the keen disappointment over Von Jaksch at Prague, his modesty, courtesy, and camaraderie made a deep impression on me. I can well understand how Payr in a memorial tribute, a tribute that has the ring of sincerity, while referring to Strümpell's noteworthy contributions, especially in neurology, dwelt chiefly on the human side of him whom he called the "last of the bedside clinicians." He referred to Strümpell's optimism, his interest in everything beautiful and joyous, how they, the Leipzig clinicians, had just lost the most lovable of their fellow-workers, the comrade ever most ready to help, with his calm, clear view of life and its realities. He closed: "Man musste ihn lieb haben."

I am sure that one reason why Strümpell's *Practice*—for years so popular in Germany—appealed to me then as it does now was not alone because of its superior qualities as a medical textbook but also because it reflects, as do his memoirs, the human side of the author, which was so delightfully revealed to me on that memorable visit to the small university town of Erlangen.

At Munich I attended clinics by Von Ziemssen and Von Winckel; saw Bollinger and Braun; and was greatly impressed by Erb at Heidelberg. This learned neurologist gave a clinic which he adapted definitely to the task of teaching undergraduates rather than exhibiting his own learning. The patient shown had pulmonary tuberculosis. After the fashion of the German clinic, he called a student into the arena. As the student examined the patient, Erb pointed out the errors of the student, quizzed him, explained physical signs. He was not satirical; he was helpful. There was an atmosphere of dignity and seriousness that pervaded this clinic; no flippancy, no showing off of the professor at the expense of the student. I am sure no rowdyism would have been attempted with Erb.

At Heidelberg I witnessed an interesting feature of student life—a *Fackel-Fest*, or torchlight procession. This was in honor of the seventieth birthday of Kuno Fischer of the philosophical faculty. From a corner of the hotel garden I could see the fine-

looking professor as he came to the balcony of his residence and could hear his words as he thanked the students. "I have been," he said, "for years looking for the meaning of life, like Goethe hoping for more light, and—*Sie bringen mir Licht!*"

We had a pleasant trip down the Rhine to Cologne. Then to Brussels, Ostend, Dover, and London.

Before sailing for home we made a short trip to western England to see relatives of Mrs. Herrick. I took a day off for a visit to a meeting of the British Medical Association that was held at Bristol. Because of an ill-fitting and unbecoming suit of Bohemian-made clothes, I was ashamed to make my identity known. From a rear seat I attended a session devoted to medicine. I recall few of the men save Sir Douglas Powell, who spoke on heart disease, and Dr. W. Hale-White (later Sir William), who read a paper on pyrexia and its treatment, especially in typhoid fever. He or someone who discussed the paper strongly advocated the use of antipyrin, citing an experience with it in the case of a cousin who had been desperately ill and to whom he had given the drug. To his surprise, he said, the cousin had recovered. In the discussion, a tall, lanky physician apparently from the country came forward and said he was interested in hearing the remarks of his distinguished city colleague whose experience was, of course, greater than his own. "But," he said, "I'm not in favor of the drug. I gave antipyrin to a desperately ill relative and he died. And, gentlemen," he added, without cracking a smile, "it was not to a cousin, it was to a *brother*." He sat down. Perhaps the English haven't as quick a sense of humor as Americans, but the audience caught the point. There was suppressed amusement, a little nudging of neighbors, as they watched the flush on the cheek of the prominent metropolitan physician. The country doctor had scored. By his delicate sarcasm he had taught a lesson in logic.

We reached home after a pleasant trip on the American liner "City of Paris," feeling well satisfied with our three months' stay in Prague.

We had hardly removed our wraps after reaching home,

when the maid told me there was a young man at the door who wished to speak to me. He said that in the absence from home of of our friends and neighbors, the Blairs, who lived just across the street, he was caring for their house. Their pet dog seemed to be quite ill. He apologized for intruding so soon after our arrival, but could I call right away to see Fido. I begged off and suggested a veterinary.

When I reported the request to the family—and it included Father and Mother, who had come in from Oak Park for the gala welcome home—they were much amused, especially Father. "Jim," he said, "I thought you were making a mistake to leave your rapidly growing practice and spend so much time and money in study in Europe. But I was evidently wrong. It is clear that nothing adds to a doctor's reputation like a trip abroad. It's marvelous; you've been home only fifteen minutes; look at the important call you have had!"

I took up work with renewed zeal—practice, teaching, writing. In 1895 I published a small *Handbook of Medical Diagnosis*, which so well filled the long-felt want that no second edition was ever called for.

Four years later, in 1899, it was evident that I was again overworking. I was sleeping poorly and had grown restless and irritable. Mrs. Herrick said there must be a change of scene and a period of rest away from Chicago. A few days later, on October 14, I sailed for Naples on the North German Lloyd steamer "Ems," planning to go to Vienna for a month's stay, on the way seeing a little of Italy, as well as stopping a few days at Würzburg to visit Leube's clinic. I would return about Christmas via England. Dr. Arthur R. Edwards, professor of medicine at Northwestern University, was leaving for Vienna in a few days, so he and I arranged to share a cabin. There was mutual pleasure in having companionship.

The "Ems" was a small steamer of 6,000 tons, old, yet seaworthy. But how she did roll! We went ashore for a few hours at Gibraltar, had a quick view of the famous fortress, and saw

the fine drill of a regiment of British soldiers who were to leave soon for the Boer War. A soldier whispered to me in confidence that with the rank and file of the army the war was not popular—it was "brought on by the politicians."

Gibraltar is fixed in my memory also because at that port there came aboard a prosperous and pompous English tea-merchant who was returning from China with his two old-maid daughters. Before his advent our meals had been pleasant, with a sort of intimate, chatty, home atmosphere pervading the group of sixty or seventy passengers who in the ten days had become well acquainted. Now all was changed. The Englishman, who had secured a seat next to the captain, assumed an air of authority. He was patronizing; to quote a phrase from Fenimore Cooper, he was "condescending with all his might." He would butt into a conversation going on across the long narrow table: "My dear sir, you are quite mistaken; let me set you right, etc." He was a nuisance and threw a chill over every meal. He monopolized the small promenade deck. On a bright, clear morning, when the blue Mediterranean was without a ripple, I was standing at the rail taking in the beauty of the scene as we passed Sardinia. Two small war vessels, Italian and Austrian, were sailing slowly side by side as though, for a time at least, they had forgotten old enmities. We were so close to shore that we could see the houses and the people on the shore and on the cliffs. I was in a daydream, thinking of home and vowing that some day I would bring Mrs. Herrick to share in the joys of such a trip. At this moment who should appear to interrupt my reverie but our self-important Briton.

"Good morning," he broke in, "that's Sardinia, don't you know." Rather coolly and with a half-interrogative, rising inflection I replied, "Yes?" "That's where the sardines come from." "Yes?" "Let me tell you how they catch them. Perhaps you have seen the tin boxes in which the sardines come? Well, sir, the fisherman takes one of these empty boxes, puts in a little bait, then sinks it in the water at night. The fish go into the box, pack themselves in tight, alternating heads and tails

so that when the fisherman takes out the box in the morning all he has to do is to put in a little olive oil, seal it up, and there you are! Thousands of these boxes are packed every day." "Yes?" I rather indifferently replied. "My dear sir," he said, "I wouldn't like to deceive you. Really, that's not so. It's a joke!" He chuckled; I made no reply. He left, seeming self-satisfied but a little disappointed. Perhaps he muttered, "Stupid American." My inner comment was "Conceited ass!" He was in no sense a representative of the upper-class Briton or of the lower-class laboring man or cockney. He was, I believe, of the bourgeois *nouveau riche*, a type which is by no means confined to Great Britain.

After two days in Naples and Pompeii and a short stay in Rome we reached Würzburg. We spent two weeks here, going daily to Leube's clinics, seeing also a little of the work that was done by the genial pathologist, Rindfleisch, and by a few others. I gained the impression that Leube and Rindfleisch had a feeling of inferiority. They seemed surprised that in coming to Bavaria we had chosen the provincial school rather than the greater one at Munich, where larger hospitals and more renowned men were to be found. I do not know the real facts in their case but surmise that the two may have been disappointed at failure to receive calls to higher positions in the capital of the province. That promotions in Germany and Austria were often dependent on political partisanship, personal favoritism, wire-pulling, or racial prejudices I knew from my observations at Prague. It is clearly revealed to one who reads the memoirs of Billroth, Strümpell, or Von Leyden.

Edwards and I had wished to see Leube because both of us had been strongly attracted by a study of his two volumes on *Clinical Diagnosis*. He possessed a rare gift of sensing the difficulties that confronted the young practitioner. In an intimate, friendly manner he would make a helpful suggestion here or utter a word of warning there. He often cited his own experience, including his mistakes. Even today I recall how he dwelt on the value of certain signs of fluid in the pleural cavity; how

he discussed the salient diagnostic features of typhoid fever, not the odd or occasional features but the commoner ones like the spots, the spleen, the relatively slow pulse. He commented one day in the ward that in twenty years he had not failed in differentiating between typhoid fever and miliary tuberculosis. Again, it was easy, because of the frequency of hemorrhoids, to lose sight of their possible significance as indicating trouble higher up in the bowel. Digital examination should never be omitted; it might reveal disease like carcinoma. His writings were scientific, practical, and eminently helpful. His clinical and ward talks were of the same character. As I listened to him I wondered if his modesty, simplicity, and kindliness indicated a lack of force or aggressiveness that might explain, in part, why he, an aging man, was still in Würzburg. The past history of this small medical school has shown that it was capable of nurturing men of power who rose to prominence. Virchow had done some of his best work there. From Würzburg, Schönlein had been called to Berlin. It was in the department of physics that Röntgen made himself and the university famous by his discovery of the x-ray.

As we left for Vienna, we felt that we had profited by our few days with Leube. We had rested and had read much. We had been well cared for in a good hotel with a beautiful view of the Main Valley. Up to the day of our leaving, our landlord had treated Edwards as the more important of his two guests, probably because he always took the lead. Shortly before we left, however, a letter came addressed to "Professor James B. Herrick." That word "professor" changed everything. As we got into the bus to go to the station, Edwards was accorded but a meager, formal handshake. To me, the landlord obsequiously bowed low, shook my hand two or three times, and wished the *Herr Professor* a pleasant journey and a cordial *Auf Wiedersehen.*

For several years, Vienna had been popular as a "finishing school" for many a young American doctor who, as soon as he could afford it after having completed his internship, hurried

to the Austrian capital, attracted by the rich assortment of "courses" that were offered in the medical school by many competent docents and assistants. For a sum that seemed quite reasonable or even paltry, the American could join a small class and have twenty to thirty lessons in laryngology, ophthalmoscopy, gynecologic diagnosis, etc. The instructor had plenty of cases for demonstration and practice. Some doctors remained a year or more, majoring in some one subject but choosing helpful supplemental or complementary work. One of the more popular courses was that of Kovačs in internal medicine. This was controlled by the Americans through a sort of self-perpetuating membership. A doctor, once in, stayed as long as he wished, even a year or more. When he left, the next one on the long waiting list was admitted to the select group of eight. Except that Kovačs himself reserved the right to name one or two men to fill a vacancy, the course was owned and operated by Americans.

Much the same condition obtained in other courses. A shrewd Chicago doctor told me how he had hired a leading neurologist to give him personal instruction for one hour a day in the laboratory or ward. The hundred dollars which it cost was a cheap price. To the poor Austrian scientist it was a godsend. Some of the Americans were fortunate enough to get in closer touch with the heads of departments, serving as assistants, perhaps in ophthalmology or dermatology.

Most of the men who studied in Vienna in the late nineties became good or even outstanding clinicians. Yet I sometimes wonder whether the type of work done there did not train them in skilled craftsmanship rather than in habits of logical thinking which might serve them later as the basis for a higher grade of work in original observation and investigation. In some of these men who had had long instruction in these "courses"—they were not all from Chicago—I detected what seemed like a tendency to worship unquestioningly, much as did the medieval physicians, at the shrine of authority, a tendency that easily leads to false beliefs and errors in practice.

My stay in Vienna was to be so brief that I registered for only two exercises—Neusser's daily clinic in medicine and the five o'clock demonstration in pathology given by Albrecht.

Vienna was carrying on the tradition of Skoda, Oppolzer, Bamberger, Hebra, and Rokitansky. The *Diener* who had worked with Rokitansky said pathology was the same as in the olden days except that bacteriology had been added. In medicine, diagnosis based largely on pathologic anatomy was still stressed, though, as Skoda in his farewell address had predicted, physiology and chemistry had become of major importance.

Edmund Neusser, then forty-seven years of age, head of the second medical clinic since 1895, was regarded as the most brilliant internist since Skoda. He was of an artistic temperament and had hesitated for long before deciding on medicine rather than music as a profession, for he was a skilled pianist. Having reached his decision, he made most thorough preparation for his lifework. He studied physiological chemistry for two years, I believe with Hoppe-Seyler. His knowledge was encyclopedic. His clinic was not of the traditional textbook style, a mere rehearsal of the well-known facts in medicine; it was an exercise in logic. There was nothing dramatic about it, no oratory. Neusser appeared to be shy and embarrassed, as, with head down and in a low voice, he revealed the mental processes by which he had reached his conclusion.

In my notebook I refer to him as a "remarkable man." He was especially noted as a diagnostician. Students told how he had sent one hundred and forty patients to the dead-house without an error in diagnosis; how he had diagnosed "lead neuritis of the vagus nerve"—a diagnosis that was confirmed at autopsy made by Weichselbaum, who had added: "God only knows how he did it." These stories were probably largely apocryphal. But Neusser's careful and critical consideration of the minutest details of the history, physical signs, symptoms, and laboratory findings; his application of the facts of physiology and chemistry, with which subjects he was quite familiar; his ransacking of the literature and his own rich clinical experience

for comparable cases; his analysis and summary of all the evidence by which he reached his diagnosis—all this was a revelation and an inspiration to the thirty or forty doctors (there were few undergraduates) who faithfully attended his clinics. My notes show how he accurately foretold the exact spot in the bowel where a stenosing carcinoma would be found. I have a record of the ten points that he brought out in favor of his diagnosis of a mass in the upper abdomen as a cyst of the pancreas against the surgeon's diagnosis of carcinoma. Operation showed that Neusser was right.

Yet Neusser was fallible. For three successive mornings he discussed a case of supposed hypernephroma. The clinical necropsy by Weichselbaum, a few days later, showed that what had been taken for an adrenal tumor was a carcinoma of the caecum. The next day was devoted by Neusser to an explanation of how he had erred. The case, including the post-mortem, had occupied five clinical hours, but it was most instructive.

It may be questioned whether Neusser's meticulous discussion of the niceties of diagnosis is the best method of teaching even postgraduates. Perhaps the substance of what he said might go over better if it were published in a journal, where it could be deliberately pondered over by the interested physician, though it must be admitted that often the word is more stimulating when spoken than when written. But Neusser taught facts and method very effectively, and never more so than when he frankly admitted and explained his mistake, as in the case described.

Early in 1900, Neusser contributed to Nothnagel's "System of Practice" a small volume on *Disease of the Suprarenal Capsules*. May it not be that, at the time he made his much-talked-about mistake in diagnosing a carcinoma of the caecum as hypernephroma—and there were bone metastases which were recognized *intra vitam*—he was reading and thinking so much on this topic that he was more easily led astray. All physicians have had similar experiences of overlooking the obvious because of too much attention to more recondite, really nonessen-

tial minutiae. Through the irony of fate Neusser died in 1912 of hypernephroma, which was sometimes spoken of as "Kahler's disease" after his immediate predecessor, who had accurately described it and had emphasized the frequency of bone metastases.

Besides Neusser's clinic and Albrecht's pathologic demonstration, I glanced at a few other things of medical interest. As a guest, I visited one of the class exercises of Kovačs and could see why he was rated high. I listened to an old-style clinical lecture delivered by Nothnagel before about three hundred undergraduates; heard Krafft-Ebing; and witnessed many post-mortem examinations.

There were a few walks around the city, an occasional concert or opera. I enjoyed the meals at the Riedhof Hotel, especially the delicious chocolate, for which Vienna was justly famed. Then there was a gay evening at the home of Frau Schindler, who was the landlady of Dr. George Dyche and his mother, of Evanston, and of Dr. Harold K. Gibson, of Chicago. The genial Frau gave a Thanksgiving dinner to the Americans. We had turkey with all the trimmings. There were American and Austrian songs. The Schindler boy spoke his piece, "Andreas Hofer." There were toasts to this one and to that one, drunk in various wines of ancient vintage that came from the Frau's well-stocked cellar. Prim Mrs. Dyche, who was a good Methodist, was shocked beyond words at the hilarity.

In December, Edwards and I parted. He stayed in Vienna a while longer before leaving for Rome, where he was married on Christmas day to his American fiancée. On my way to London I stopped in Zürich to call on Helbling, a Swiss friend whom we had met on the boat, and also to attend Eichhorst's clinic. During my two days in London I went with J. Mitchell Bruce as he made his ward rounds. He was disappointing. A patient complained of pain in the back. Without examination, merely listening to the history, Dr. Bruce said to the group of students, "Wouldn't it be interesting, now, if that were due to the pressure of an aneurysm. An aneurysm will make pain at times,

you know." Suggestive, perhaps, but surely a poor example for students.

Sailing from Southampton, I arrived in Chicago refreshed and in time for Christmas.

It was a happy homecoming, though I was not prepared for the cool, almost frightened, reception given me by my young son, John, now sixteen months old. In the two months' absence he had quite forgotten me. It was several days before he would associate with me on terms of familiarity.

A word about Arthur Robin Edwards. Great things had been expected from him. He had won first place in the County Hospital examination for interns in 1891. He was a fiend for work, a keen clinician, an excellent teacher, and he seemed destined for leadership in Chicago medicine. But not long after his return from Europe things began to go wrong. Friends deserted him. He was discredited as dean by the faculty of his own school, the Chicago Medical College. Solitary, sad, he was a pitiful contrast to the jovial, hearty Rob Edwards of earlier days. Ill health completed the tragedy of his failure, and he died in the East, a sorry wreck of his former self. The explanation of his failure was, I believe, that he considered too much his own interest, too little that of others. To gain his own end he did things that were most reprehensible. I first became aware of this side of his character on our trip to Würzburg and Vienna in 1899.

For some time I had realized that chemistry was destined to play an important role in medicine. It was increasingly difficult for me to read understandingly articles that involved the application to clinical medicine of the facts and principles of biological, physical, and organic chemistry. So, in the fall of 1904, though forty-three years old and busy with consultation practice, I matriculated at the University of Chicago for courses in these subjects. Until March, 1905, I went to the university four or five mornings a week, taking for one quarter a laboratory course in physical chemistry under Julius Stieglitz, the next quarter one in organic chemistry under J. U. Nef.

I also attended as a listener a class exercise in physical chemistry conducted by Alexander Smith. A prominent internist in the East strongly advised me to pursue the subject further by going to Berlin and working at some problem in the laboratory of Emil Fischer. This suggestion greatly appealed to me. On such a trip I would learn more about chemistry and would find by experiment whether it was possible or wise for me to attempt in the future any laboratory research—I had often been urged to do so but had demurred, feeling that I was not cut out for that type of work.

I was fortunate in securing a place in Fischer's laboratory, where for some three months I was busy morning and afternoon with organic chemistry. At first my work was based on selected exercises taken from his compact *Die organische Präparate.* Later, I undertook a small *Arbeit.*

Professor Fischer was then at the height of his fame. In 1902 he had been awarded the Nobel prize for his pioneer research on sugars. He was now engaged with his "polypeptid" problem, analytically splitting proteins into their constituent parts and trying to construct synthetically a body that approached as nearly as possible the complex, puzzling albumin molecule. With Emil Abderhalden, the gifted Swiss, as his first assistant, he kept the laboratory humming with students investigating this and other topics. The air was filled with talk of amino acids, alanin, leucin, asparginic acid. Odd protein-containing material was used for analysis. Dr. H. Gideon Wells had worked on horsehair, Dr. E. R. LeCount on feathers. To me was assigned a vegetable substance, conglutin.*

I wish I could draw a lifelike picture of Emil Fischer as I saw him. He was then fifty-three years old, his dark hair and beard streaked with gray. He was above medium height, erect, not portly, in his gait deliberate and elastic, yet in no sense sug-

*See E. Abderhalden and J. B. Herrick, Beitrag zur Kenntnis der Zusammensetzung des Conglutins aus Samen von Lupinus, Ztschr. f. Physiol. Chem., **45**: 479, 1905.

gestively military. He was modest, kindly, always the gentleman. Twice a day he made the rounds, moving quietly from desk to desk inspecting the work, always seeming interested, criticizing, helpfully suggesting. He had the faculty of seeing quickly where one's trouble lay. So gentle in manner was he that one scarcely realized that he was a good executive commanding officer; one might get the impression of weakness. But he was far from weak. When Schmitz thoughtlessly caused an explosion in the evaporating chamber by failing to turn off a pilot light while he was evaporating ether, and the laboratory fire squad with its sand cart and hose was called upon to put out the fire and gather up the shattered glass, there was no outburst of anger but a straight-from-the-shoulder statement about stupidity and violation of rules that were plainly printed and that should have been known to any freshman. Schmitz was made to feel worse than if he had been publicly flogged. When, in making a Kjeldahl determination, I made a mistake that blew the cork from the flask to the ceiling, Fischer only remarked, "My dear Professor, you were in luck that it was the cork that gave way and not the glass—your eyes are spared." Did I feel small!

In his weekly seminar, too, Fischer gave evidence of active virility as well as of wide knowledge of his subject. This seminar was a sort of journal club, where advanced workers reported on new books and recent articles in journals. Fischer presided at these sessions. They were never dull. Reports had to be brief and to the point. He always encouraged discussion and questioning, and often added a final word of approval or suggested that the reporter would find corroboration of his views in an article just published in an English or American journal. When, however, the speaker rambled on about supposedly new and startling results that were published in some journal—perhaps a German journal—Fischer might interrupt him, "Na! we can't listen to that! Old stuff! Ten years ago a Frenchman proved that those views were entirely wrong. My dear doctor, look it up."

When I started in with Fischer, I stated that my object was

not to become a chemist, but to get an insight into the subject that would enable me to understand better the value of chemistry as applied in medicine. He took in the situation at once. He always had my purpose in mind and never treated me as though I were a candidate for a Ph.D. degree He invited me to see investigations going on by others, for instance, that of two Japanese, over in a corner, who were working on the problem of synthetic rubber. They kept much to themselves, yet out of curiosity came around to see what others were doing. The only time I ever saw them openly manifest enthusiasm was on the day when news came of the Japanese naval victory over Russia. As laboratory workers went to their corner and called out "Banzai!" the Orientals acknowledged the congratulations with smiles and most profound bows.

Rona, an Italian, had been working for a long time on dyes for textiles. Fischer had him show me the large-page scrapbook that contained samples and records of the process. On one page would be the chemical formula of a particular dye, its stereochemical representation, and a sample of the color. The problem was largely to see what effect on the color would be brought about by the substitution of, let us say, hydroxyl, for a radical of equal valence, or the addition of a trace of sulphur. On the same page were specimens of cloth—linen, cotton, silk, wool—that had been stained by the original dye and by the altered one. The results of washing, ironing, and exposure to the sun were also recorded. Page after page of this fascinating work was shown. It was a demonstration of how theoretical science may be applied to practical everyday affairs. To these savants it was almost as simple as it is for the house painter to mix his colors, adding a bit of blue here or red there until a desired shade has been secured. It made clearer to me how applied research had made Germany a leader in many industries. Thoughts of this type of work often came to me during World Wars I and II, as, one after another, destructive chemical or physical agents were devised by Germany.

I left Germany in the summer, feeling that my time had been

profitably spent. I had learned much about organic chemistry; I was convinced that laboratory research was out of my line, in spite of the strenuous arguments of some of my friends.

Professor Fischer, through many friendly acts, had contributed much to the pleasure of our stay in Berlin. He had courteously called on Mrs. Herrick and me at our *pension*. We had returned the call at his pleasant home on Wannsee, a home lonely and saddened by the recent death of Mrs. Fischer. One day he asked me if I would like to go with him for a week-end trip to Halle, where he wished to talk over some matters with Von Mering, who, with Minkowski, had made the well-known experiments on diabetes and the pancreas. Of course, I was delighted. The day before we were to leave, Professor Fischer showed me a telegram from Von Mering saying that the conference would have to be postponed, for his son had just had a serious, perhaps fatal, hemorrhage from the stomach. It was a disappointment to miss meeting Von Mering and to lose the pleasure of a journey with Fischer.

The festival of the Bier-Zug of the department of chemistry was an annual event. Fischer and Abderhalden both said we Americans must go, and everybody went. There was a delightful trip on the river in a boat chartered for the occasion. All formalities were laid aside; student and professors met on an equal footing. The brass band blared, the students sang and yodeled, there were gay costumes and clownish performances. There was plenty to eat. Much beer was consumed, yet there was no drunkenness. In the *Bier-Zeitung* were cartoons, squibs, and poems, in which the boys razzed Fischer about veronal, which he had invented; poked fun at Abderhalden, who was a teetotaler and never smoked; rubbed it into the Americans, who were none too popular. It was a gala day.

I recall no British workers in Fischer's laboratory at that time. That they were *personae non gratae* was revealed by an incident worth relating. Dr. LeCount and I, wishing to show our appreciation of some kind acts done by Schmitz, the man who had unfortunately caused the explosion that I have described,

one evening had him as our guest. After dinner we talked long and frankly in LeCount's room about Germany's internal and international affairs. Schmitz was a lieutenant of artillery who in civilian dress worked with Fischer on skatol and indol—often workers rather suggestively sniffed and closed the nostrils with the finger as they passed by his desk. He told us how he hated German officialdom, how angry it made him when, if in civilian dress, he was pushed off the sidewalk by an officer in uniform, how he resented being ordered about by the station master with his visored cap and brass buttons. He was opposed to the enormous expense that Germany was incurring in keeping up her huge army and in enlarging her fleet. "I hate war," he said, "but believe me there is one nation I would like to fight· England! Everywhere we try to go she blocks us. She is our enemy." He pledged us to secrecy. If what he had told us in confidence were known, he would have to spend at least two years in prison. In retrospect one may well have the feeling that —as Seward said about our Civil War—World War I was an irrepressible conflict.

Many other pleasant memories of Berlin still linger—of visits to galleries, museums, palaces, to Potsdam and Charlottenburg, especially the review of troops that was held that summer. Through the efforts of our landlady and the kindness of one of her boarders, Admiral von Treppel, whose name became prominent in World War I, we were given a ticket entitling us to witness the review of 40,000 troops on Tempelhofer Field. It was a wonderful exhibition; the German military machine clicked without a hitch. From exactly eight o'clock until noon, infantry, cavalry, artillery, passed in review before the Kaiser, who with the Crown Prince was much in evidence. A Japanese delegation was given special attention. We were favored in having one of three hundred carriages that were permitted on the grounds; our seats were choice ones; we had a better view than the five thousand occupants of the bleachers.

The festivities were continued with the celebration of the marriage of the Crown Prince to Princess Cecile, which pro-

vided a wonderful spectacle for several days. Some years later, after Germany's defeat in War I, Mrs. Herrick and I ran across the Crown Prince at Taormina and Villa d'Este in Italy, where he was traveling incognito. He seemed like an ordinary human being, not above the average in intelligence.

We made a delightful week-end excursion to the Spreewald, visiting the country that for several hundred years had been occupied by the Slavic Wends. Their rural life, their native peasant ways, and their Venice-like canals were most interesting. The young Wends told sorrowfully how the German government had lately begun, slowly but systematically, to force them to give up their language and customs. Ultimately, they would have to be completely Germanized in order to live.

We spent the Whitsuntide holidays—*Pfingst Ferien*—in Copenhagen. We were joined in this pleasant trip by Drs. Wells and LeCount.

We had an uneventful voyage home.

CHAPTER VIII

Consultant and Specialist

I would much prefer a scholar who investigates and does excellent work in a limited field, to one whose knowledge may be extensive but who has accomplished nothing remarkable in any particular line.

DU BOIS-REYMOND

ON JANUARY 1, 1900, I sent a notice to all my patients and to many doctors, announcing that, from that date, my work would be limited to consultation, office, and hospital practice. I have never questioned the wisdom of thus restricting my medical activities, though for a time I wondered whether the manner of announcing the change had been too abrupt. Some of my old families felt hurt, perhaps justly, feeling that their loyalty to me had been rather coldly repaid. I was able to make some amends by recommending competent men to take my place. In the long run, however, I believe it was the best method. All patients, new and old, rich and poor, were treated alike; I would care for them in the office or in the hospital or would see them at their homes with other doctors, but I could not act as their "house doctor."

I was prepared for the temporary drop in income that came. I had not foreseen the depression of spirits that resulted from the hours of idleness; days with no new calls, almost no practice. Had I made a mistake?

After a time, rather slowly at first, work picked up. More

referred cases came to the office. There were more hospital patients, both pay and charity; more consultations in the city and suburbs. Then calls came from physicians outside the Chicago territory. In the succeeding years I was kept busy making trips over much greater distances. Those many busy years as a general consultant in internal medicine are a most pleasant memory.

Consultation practice is quite different from family practice. It is more complicated because it is concerned not with two parties but with three—the patient, the attending physician, and the consultant. To see that the welfare of the patient is not overlooked should be the first duty of the consultant. He also has a definite duty to his colleague. The family doctor is to be treated with courtesy and fairness. He must be helped to a better understanding of the nature of the illness and its proper treatment. All this has to be done by the consultant in a tactful, noncondescending manner, yet with no sacrifice of his own personal standing.

The consultant's duty is generally simple: he confirms the diagnosis, perhaps suggests some minor change in management, or offers a more hopeful prognosis. At times, as in a hopeless case of advanced cancer or tuberculosis, all he can do is to satisfy the friends that no more can be done than is being done by the regular attendant. Such conferences are by no means useless formalities. They fulfil a real function; they tend to remove uncertainty as to whether the patient is properly cared for. Uncertainty is one of the most distressing features of any illness.

Yet some patients, when told that little help can be offered and that there is no prospect of a cure, are very critical of the consultant. They may be bitterly resentful, as in a case of mine in which the husband for long refused to pay my bill "for simply telling me my wife's cancer was hopeless." Later, when time had softened his sorrow over her death and he realized that some forms of disease were beyond the power of medicine to cure, he apologized.

It is easy to get along with an honest, common-sense, capable doctor who has no exalted view of his own importance or who

does not haughtily regard the consultant as an intruder. Minor differences of opinion are ironed out in a frank discussion; suggestions are graciously received, and a plan of management acceptable to both is agreed upon. But not every family doctor is built on this model.

A difficult or even serious situation may arise at a consultation when it is apparent that a faulty diagnosis or improper treatment may be leading to harmful results. A cowardly or dishonest doctor may ask that the truth be concealed. But the rights of the patient must be protected even though the error of the doctor is disclosed. Fairness to a colleague should lead us to view charitably errors which anyone is liable to make, and to defend a fellow-practitioner to the best of our ability. "It is not the man who never makes a mistake," said Dr. Billings to me one day, "for 'there ain't no such animal.' It's the man who makes the fewest." It ill becomes us to speak slightingly or contemptuously, merely because a mistake has been made. As Leigh Hunt says regarding the bad habit of indulging too frequently in irony, "let him that is without one cast the first sarcasm."

The reaction of doctors when their mistakes are disclosed is by no means uniform. From a large number of cases I can best illustrate this fact by citing some in which a collection of pus in the pleural cavity (empyema of the chest) had been overlooked.

I was called by Dr. S. to a small city one hundred miles from Chicago to see one of his well-to-do patients. "I can't afford to make any mistake here," the doctor said, "this man is one of our most prominent citizens." Dr. S. was frank and good-natured; in action as in word he fairly radiated honesty. Fearing he might not be quite up with the times, he had not hesitated to ask help from one who, he thought, was more up to date. "I think this man has an unresolved pneumonia," he said, "but the fever hangs on and the lung doesn't clear up." When I proved to him that the trouble was an empyema following the pneumonia and that operation was indicated, he was delighted.

In the second case the physician was likewise honest. He was of the rough-and-ready sort, blunt of speech. Unlike Dr. S., however, he felt that no one could tell him anything worth while; he knew it all. He was a professor of orthopedics in one of our Chicago schools, yet had a large general practice. "Dr. Herrick," he greeted me, "this consultation is not of my asking. When the family suggested that I call you, I told them it was their privilege but they would be throwing their money away. The father, who is eighty years old, has an unresolved pneumonia and nothing can save him." Then, after giving me the history, he had me go alone to examine the patient. After I had done this, we talked things over in a small side room, with the door closed. I said, "Doctor, I think your patient has had pneumonia and now has pus in the chest." He interrupted: "By George, I don't." "There is one sure way to tell," I replied. "That's right, but I haven't a needle." "Well, I have." "All right, go ahead and use it," he blurted out; "I won't." To the family he said: "Dr. Herrick and I don't agree at all. He says your father has pus in the chest; I say he hasn't. Now I'm asking the doctor to make good by drawing off a little of the pus which he says is there. Yes, it's a perfectly safe thing to do." I drew off a syringeful of fetid pus. Dr. X was speechless. We went again into the small room, and he exclaimed, "That's a hell of a blunder. I'll have the pus out in thirty minutes, as soon as I can get the tools. Do you think he will recover?" "No," I replied, "I think the case is hopeless." The patient died in spite of the operation.

In the third case the doctor was a good general practitioner who was highly esteemed by patients and colleagues in the city of some 30,000 people where he had practiced for many years. The patient was a child on whom he said he must operate promptly for an acute appendicitis. He recited the history to me. As I was walking upstairs to see the patient I heard the rapid "expiratory grunt" so characteristic of pneumonia in children. When I saw the cyanotic face, the nostrils dilating with the breathing, I said that I would like to examine the back. The

doctor with genuine alarm said he must protest; it was dangerous to move her because it might lead to rupture of the appendix; if she was to be moved, I must take the responsibility. Assuming the risk, I examined the chest posteriorly, finding evidence that convinced both of us that there was a pneumonia. There was no operation for appendicitis. Some three weeks later I was called to see the child again. Dr. B. said the pneumonia was slow in resolving, the whole right side was still solid. By exploratory puncture I proved that there was pus in the chest. The next day the doctor operated for empyema. A week later, I was again called. The pus, Dr. B. thought, must be pocketed, the discharge had stopped. I found that the drainage tube was clogged. The child recovered. Though Dr. B. had previously often sent patients to my office or had called me to see patients with him in his own town, for ten years I never heard from him. Then when he was an old man he again began to send for me. Later, I saw him in his fatal illness.

The fourth incident concerned a lad of seventeen, whom I saw at the home of his father, a prosperous farmer living about ten miles from the doctor, who was the leading physician in a small city, where he had his own private hospital. The doctor greeted me politely, but with a strange reserve. He insisted that our conference be entirely in the open. I was to reach an independent conclusion with no statement from him as to his own opinion. The meager information I managed to elicit from the family seemed to indicate a long-drawn-out pneumonia with no recovery at the end of three weeks. With the mother I went in and examined the patient, without the presence of the doctor; it took but a few minutes to satisfy me that the boy had a huge accumulation of pus in the pleural cavity. I then asked the doctor for a moment's conversation with him alone. A little petulantly, perhaps dramatically, but certainly stubbornly, he refused: "Tell what you think is the matter with him. There is to be nothing secret here." He was evidently startled when I announced, "The boy has had pneumonia, the right chest is full of pus; an operation is needed"; but he quickly recovered his poise.

He refused to go near the patient when I drew off a syringeful of pus. I was bombarded with questions by the family, the doctor all the time remaining silent. When asked what surgeon I would advise, I replied that they could not do better than to let the doctor operate in his own hospital. Laconically he said he would send the ambulance in the afternoon and would operate the next morning. We parted courteously. The priest who drove me to the train remarked that he thought the explanation of this strange conduct was that the physician himself did not know the exact nature of the illness. The operation was performed, and the boy recovered.

I never saw the doctor again. He transferred his patronage to others. What was really back of his antagonistic attitude toward me I never found out. He was a medical monarch in his home town and the surrounding territory and may have taken umbrage when the family requested the opinion of one so much younger than he. I may have given offense on this occasion or previously by word or manner, though I tried to be overcourteous and to expose his error as gently as possible.

It is not an unusual experience for a consultant to be dropped by a general practitioner by whom he has frequently been called upon for help. An error in diagnosis or prognosis may shake the confidence of the doctor in the professional ability of the consultant. Tact in the discussion of the case with the family may have been lacking. At times personalities do not harmonize; the doctors rub each other the wrong way. Again, the fee may seem too large. Or, strangely, the fee may be so small that the family and the attending physician look upon the consultant as one who sets no high value on his own services. Occasionally, the attending physician boldly requests the consultant to charge much more than his regular fee. "If you refuse to do this," the doctor says, "I shall have difficulty in asking the big one I hope to get." Next time he may call some other consultant.

A few other consultations in which the reaction of the doctor was different from those already described seem worthy of record.

"Dr. Herrick," said the attending doctor in a city some 150 miles from Chicago, "your call here is not at my request. The patient is an old man who has nothing the matter except 'nerves.' He imagines he has heart disease; claims he has pain when he walks, and at such times thinks he is dying; he is fussed over by his children and a sympathetic nurse. I have repeatedly told the family that he is not ill, he merely thinks he is. So when the children asked for consultation, which, of course, is their privilege, I made it plain that it was not necessary. Doctor, when you send your bill remember there's a lot of money here. In fact, the real trouble is that the old man is too rich; hence this consultation." The doctor had just finished talking when a cry of alarm came from the nurse· "Doctor, come quick! come quick!" We hurried upstairs but were too late. The old man with "nothing the matter except nerves, money, and apprehensive children" was dead, apparently in an anginal attack. No whipped puppy walking away with tail between its legs ever presented a more disconsolate picture of disgrace and humiliation than did the family doctor. He could only mutter. "Oh, my God! Oh, my God!"

Sometimes there was pathos. One excessively hot summer day Dr. S. asked me to see with him a baby who was extremely ill with "summer complaint." As we entered the modest home, we saw the young mother slowly wheeling back and forth the baby carriage in which the sick child lay. She whispered to us that the baby seemed better and had been sleeping quietly for about twenty minutes. When the doctor and I examined the baby, we found the baby's seeming improvement had been really a quiet death. The sorrow of the young mother was pitiful, though we could assure her she should not reproach herself for any neglect.

Occasionally the family doctor was decidedly disagreeable. One of this type informed me that the patient, an old lady, had an abdominal cancer and that nothing could be done for her. He regarded me as an intruder. He scolded the family, who, he felt, had shown their lack of confidence in him by insisting on

his calling in one who was much younger and more inexperienced than he. Here was a challenge that put me on my mettle. I suggested that before pronouncing on the character of the mass, which was easily felt in the lower abdomen, it would be wise to catheterize. He snorted that there was no retention of urine, in fact, she was urinating very often; the mass was the malignant tumor, and that was all there was to it. If I insisted on catheterizing, I could do it myself. So I inserted the catheter. As the urine continued to flow, the old lady sighed "Oh! what a relief." The family chorused "Ah! Oh my!" The doctor looked daggers but said nothing. The malignant growth had disappeared. The doctor was ugly when we parted. Fortunately for me, I did not lose my temper. I had learned by previous experience that he who loses his temper generally loses the battle.

I had several interesting consultations with a doctor who had been one of my pupils at Rush. Though a little pompous, he was an excellent family doctor, sympathetic and faithful. Occasionally he good-naturedly twitted me on what he called my old-fashioned treatment. He prided himself on being an up-to-date therapist, though I thought he was unduly influenced by the articles and advertisements he read in German medical journals. One day he asked me to see with him a woman whose "rheumatism" had proved refractory. All his drugs had failed to give relief. Perhaps I knew of some drug that would help, "even an old-fashioned one." When I said that the "rheumatism" had the earmarks of an arthritis of gonococcal origin, he flared up like a bantam cock, in defense of the estimable family that he had cared for so many years. There was no warrant for assailing the reputation of this good woman. "Where could she get it?" I suggested that we might ask her husband. The doctor demurred; he would not insult the man who, though a saloonkeeper, was a gentleman if ever there was one. If I insisted on asking the disagreeable question, he would not be a party to it, he would leave the room. So, alone with the husband, I put the direct question, and the man replied promptly, "Yes, doctor, I did have the disease. I thought I was cured, or it wouldn't have hap-

pened." Dr. M. was called in. He was dumfounded and apologetic. He congratulated me on a "brilliant diagnosis and a clever bit of detective work." I talked to him then as teacher to pupil, pointing out how the history of the illness and the findings on examination enabled one to reach an almost certain conclusion as to the nature of the case.

Dr. M. represented a type of physician who is often encountered, who is sincere and honest yet whose little knowledge is a dangerous thing because he does not know that it is little. A. Bronson Alcott expressed it thus: "To be ignorant of one's ignorance is the malady of the ignorant." A doctor of this kind is unaware of the peril that may lurk in a new untried drug or in the operation that, safe for abler surgeons, may be dangerous in the extreme in his unskilled hands. The conclusions that these men draw from their experience are often ludicrously unwarranted. One such enthusiast said to me: "Dr. Herrick, you don't mean to say you haven't used intravenous injections of boric acid in the treatment of pneumonia! Why I have had seven consecutive cases without a death!" My retort that I had had eight successive cases recover without the use of this drug—in fact with almost no drug treatment—never touched him. He was ignorant, "invincibly ignorant," of the natural tendency of certain diseases toward recovery. Another doctor, in a small country town, informed me that he had formerly treated his patients with appendicitis medically. Lately, reading so much about the advantages of immediate operation, he had decided to try the new plan. He had operated in four cases, two of which were "clean," that is, there was no perforation; two were cases with perforation at the time of operation. "Doctor," he said, "you may not believe it, but the two clean cases and one of the perforation cases died. I am convinced that operation is wrong. I am going to stick to my old medical treatment." I hadn't the heart to emphasize "you" in my reply: "I believe you had better do so." But the comedy of it—unawareness of his own ignorance! The tragedy of it—the death of the two "clean cases"!

In my consultation work I often came in contact with the country doctor of the old type that is rapidly disappearing. Though good roads, the telephone, and the automobile have made it easier for him to get help or to take the patient to one of the many good rural hospitals that have lately been built, there are still many areas in which he must often alone assume serious responsibilities, as did so many of the country doctors who were deservedly highly honored in the past. Some country doctors of today are performing this duty with conspicuous success.

For several years I was interested in watching and studying the character of a doctor who had a good practice in a rural community about twenty-five miles from Chicago. He frequently called me in consultation. He was energetic, kindly, and faithful to the interest of his patients. He had a good deal of native shrewdness, yet was woefully ignorant of scientific medicine. He was not, however, so dangerous a man as one might think, for he knew many of his shortcomings and honestly admitted them.

Late one evening I was seeing with him a woman who was in coma. We could find no evidence of fractured skull, cerebral hemorrhage, or overdose of a drug. When I asked him what the urinalysis showed, he was evidently caught off his guard. Quick-wittedly and half-jokingly, he feigned surprise that I should ask such a question: "Why, doc, don't you realize that you're in the country? We don't do such things out here." Putting a little of the catheterized urine into a kitchen spoon, adding a few drops of acetic acid in the shape of vinegar, and boiling over the lamp, I showed him an almost solid cake of albumin. "Doc," he said, "I believe you know more than I do. That's why I called you."

As a sequel to this sketch: A few months later I met him in the corridor of the Presbyterian Hospital in Chicago. "See here, Dr. Herrick, I brought a patient in to Dr. Bevan. My diagnosis was cyst of the ovary with twisted pedicle. Bevan diagnosed gallstones and operated. You can see who was right."

He lifted the towel that covered a basin he was carrying and showed me a handful of gallstones. "I've counted 198," he said; "perhaps I missed a couple. I am taking these to show the husband that I was quite right in urging an operation. Bevan's a pretty clever lad, isn't he?" Not all his type had his saving sense of humor or his honesty.

For a physician to act as a consultant implies the assumption on his part of a certain superiority in the science or art of medicine. This superiority is virtually admitted by the family doctor when he calls on his colleague for help. It often happens, however, that the general practitioner knows more of some aspect of medicine than does the consultant. All this is in conformity with a general truth which, a short time ago, I found expressed by Helmholtz in his *Popular Lectures on Scientific Subjects:* The one who is "more successful than others in some one department of intellectual labour, is apt to forget that there are many other things which they can do better than he can."

As an instance in point I cite an amusing and, to me, instructive experience. I had quickly convinced the family doctor that the patient's illness which had puzzled him was acute appendicitis. We agreed that prompt operation was imperative. "You talk to her," he said, "she will listen to you; you are the professor." I tried all the rhetorical arts—exposition, persuasion, argument—but to no avail. The gentle Yiddish woman's reply always was, "You are the professor, you must know the good medicines. And my house doctor always make me well without operation." I was fighting a losing battle when Dr. L. edged his way into the conversation: "See here! What's the matter with you? Ain't you got no sense? It's dis way. You got appendicitis, ven you wait may be is too late; it busts. Then"—with his eyes and hands directed upward and with a hissing sound like that of a rocket ascending skyward—"then, pssst, it's goodbye Mary! Now you go right away to the hospital and be operated." She consented at once. I flatter myself that I knew more about the pathology and diagnosis of appendicitis than did Dr. L., but when it came to handling a patient, at least this patient, he was an expert, and I was a tyro, a "dub."

The behavior of patients at the interview with the doctor in his office or at their homes is not at all uniform. There are two types. The lawyer might call one the willing, and the other the unwilling witness. The willing witness is often overwilling, garrulous, fears the doctor will not think she is ill—it is oftener a woman—or will overlook some important symptoms. She volunteers information before questions are asked; when they are asked, she offers an explanation instead of a direct answer. "Do you have headaches?" is the question. "Why, doctor, you know my stomach is bad"; "mother thinks I worry too much"; or "Aunt Jane says it's the acid in my system." It is sometimes hard to know how best to handle such a witness. To insist on a direct "Yes" or "No" answer and thus try to switch her back to the main line of investigation and keep her there may save time and perhaps may bring out the facts you are after. But it is sometimes better to let her ramble on, for often the clue that you are after will unwittingly fall from her garrulous lips. The doctor may also learn more about the illness from the way the patient tells the story than from the story itself.

The other type, the unwilling witness, is usually one who, fearing that some serious condition like heart disease, tuberculosis, or cancer will be discovered, unconsciously or intentionally tries, by omitting or distorting facts, to steer the doctor away from any telltale feature of the dreaded disease. The patient desires an independent opinion; what another doctor has said or what treatment he has advised is carefully concealed. Witnesses of this class often expect the doctor to make his diagnosis by physical means alone—the use of his hands, the stethoscope, x-ray, electrocardiograph. They do not understand that a physician depends fully as much on a carefully elicited and accurate history as on the physical examination.

A nice old Jewish lady came to the office with her bright, intelligent daughter, who often had to act as interpreter. A week before, there had been an acute attack of pain. I tried in vain to worm out of the patient the details. The pain was "all over my body. Yes, in my hands and feet, too. Doctor, dear, I have pains this very minute, very bad, very bad. No, the other doctor

didn't say what he thought was the matter; he was just an ordinary house doctor, not a professor," etc. It was quite evident that the smiling, good-natured old lady was not suffering severe pain at the moment and that she was ducking and dodging my questions. I became irritated and showed it by beginning to treat her a "little rough." Finally, I turned to the daughter and testily said, "Won't you please tell your mother to answer my questions frankly and honestly. You and she must understand that the history of the case is the most important part of the examination." The daughter quietly said "Doctor, this seems to be a cross-examination." There was a slight but significant emphasis on "cross." She had neatly scored on me. I smiled, then she smiled. She spoke a few words in Yiddish to her mother, who, in her turn, smiled. Then the old lady pointed to the region of the gallbladder as the seat of the pain, said the doctor had hinted at gallbladder disease; she had once been jaundiced. It was a clear case of gallstone colic.

Some of the unwilling patients who bear false witness intentionally do not realize that by so doing they make the doctor's task of unearthing the truth difficult or that they may lead him into error, the harmful result of which will fall on the patients themselves. At the end of an interview with one of this kind, I said that an examination of the sputum would be necessary before I could reach a decision. Then the patient admitted: "Well, Doctor, I lied to you. Now I'll tell you the truth, two other doctors have found bugs in my spit."

The late Dr. Arthur Dean Bevan related to me a remarkable story that illustrates this point. He once told a middle-aged prominent businessman that the lump in the thigh looked like a malignant tumor, but what about syphilis? If the patient had ever had this disease, drug treatment would be in order and might save him from an amputation at the hip joint. The man denied positively any history of the venereal disease. The patient was anesthetized in preparation for a hip-joint amputation, but Dr. Bevan wisely first cut down on the mass and had frozen sections examined. The pathologist declared that the tissue was

that of a gumma. Of course, no amputation was performed. When confronted with the proof of syphilis, the man admitted that he had had it as a young man but thought he was cured. "Anyway," he said, "I was willing to lose my leg rather than own up to you and my family that I ever had the old disgraceful trouble."

I have previously referred to the importance of examining the whole body and not merely a part, in telling the story of the patient with supposed typhoid fever who really had erysipelas. The lesson taught by this experience helped me out in more than one puzzling case.

A bright young doctor asked me to see with him a woman who had a large effusion of fluid in the left chest. The cause of the condition was not clear to him. As the chest was being examined, the patient, who was fifty-five years old and unmarried, with what seemed to be an old-maidish modesty kept her clothing over the region of the breasts. When I asked her if she would not remove the clothing so that I could the better examine the chest, she hesitated and protested. Finally, with a gesture of despair, she lifted the clothing. The secret was out. There was no left breast, merely a long scar running well up into the armpit, such as is left when a radical operation for carcinoma has been performed. She then told us that, about a year before, Dr. A. J. Ochsner had operated for a tumor. The case was plain. The fluid in the chest was due to a secondary malignant involvement of the pleura or lung. The poor woman's fears were well founded. The doctor was chagrined that he had "let her put one over on him" in this clever manner. To console him, I confessed that when I was younger, through my hesitation at disturbing a woman's modesty, I had made more than one costly error of oversight.

It took me some time to overcome a certain timidity I had and to learn that people of the upper social and financial classes desire thorough examinations; some even think that because of their wealth and supposedly greater importance in the community they are entitled to a more thorough examination than

others. The late Reginald Fitz, he of appendicitis fame, once asked me how it was that Frank Billings got his wealthy patients to follow directions. He, Dr. Fitz, couldn't do it. My reply was that Dr. Billings was not the least bit awed by a man's wealth, his social or political position. With him it was not true that "the clothes make the man." When treating a patient for his health, he made no distinction between rich and poor, the one of high station or of lowest rank. The captain of industry, who was himself accustomed to giving orders, recognized in Dr. Billings a kindred spirit, born to command. Orders were issued, and they were willingly obeyed.

I may add parenthetically that not all patients, even women, are foolishly overmodest when they consult the doctor. I had just finished recording the history of an old maid of about fifty, when I was called from my office to speak to someone in the waiting-room. When I returned, I found my patient without a stitch of clothing on except a light "Mother Hubbard" gown. "I know what you doctors want," she said, as I looked my surprise; "I thought I would make it easy for you to give me the thorough examination I am expecting from you." There was nothing of immodesty about it, nothing of the smarty or sexy in her attitude. Just plain, practical common sense.

Some of my diagnostic errors were amusing and trivial, others were not so harmless. I had been rather proud of a correct diagnosis of perforation of a typhoid ulcer that had led to a prompt operation by Dr. Van Hook. We believed—and I think we were right—that it was the first successful operation of this kind in Chicago. I saw other similar cases. I caught one of the most brilliant of my colleagues in a case of typhoid perforation that he had overlooked. Less than three months later, I was called by a doctor who wished my opinion as to a possible perforation in a clear case of typhoid. I missed it. Through my error, a chance to save the life of a prominent lawyer, a useful citizen, was lost. For days I kept away from the club where I knew I would meet his partner. For several years whenever we met I felt that both of us were thinking of my costly mistake. Even

today it haunts me at times, as memory recalls with all its details this most regrettable incident.

Worried about the unusual prostration of a woman over the death of her child, I called, as counsel, an excellent neurologist. He assured me that rest and time would work a cure; there was no organic disease, it was merely functional or psychic. The next day I was hurriedly summoned to the house and found the woman had died suddenly while trying to sit up in a chair. Then the truth flashed upon me. I saw the meaning of the dark patches on her skin, the feeble pulse, low blood pressure, the sudden circulatory collapse. it was Addison's disease. I wrote to Dr. Norman Bridge, who, when he left to take up his residence in California, had recommended me to the family. I told him of my error. He wrote a kindly letter of comfort in which he prescribed for me "imperturbability." Good advice, but it was many months before the discomfiture over that case even partially wore off.

My pride had a hard fall when I had a surgeon operate for what I felt sure was a hypernephroma of the left kidney but which turned out to be enlarged spleen—a case of so-called "pseudo-leukemia" or splenic anemia. There were perhaps twenty who witnessed the operation. I can never forget the pained, incredulous look on the face of a young Russian doctor whom I had befriended. He had regarded me as almost infallible in diagnosis. Now his idol was shattered; the feet were of clay. I was but human, as were his other teachers.

In this case my error was due to the fact that when the patient came to me I was fresh from reading some articles on the diagnosis of hypernephroma written by James Israel, of Berlin. I was looking for the atypical case without hematuria such as he had described, the one in which a moderately enlarged kidney could easily be mistaken for the spleen and—here it was. As has been said by many others, it is dangerous to approach the problem of diagnosis with a preconceived opinion in one's mind as to what ails the patient.

Experiences like these made me better understand and more

ready to pardon mistakes that were made by others. They enabled me to help others to overcome and live down their chagrin at defeat. A young doctor in a small city called me to see a lad with typhoid fever; he was fearful that a perforation had taken place a few hours before. After examining the patient, I carefully reviewed the twelve days' history privately with the young doctor, gradually bringing out the salient points. Suddenly he turned pale, sweat broke out on his face; I thought he would faint. "Oh, Dr. Herrick, I see what you mean, it was appendicitis from the beginning. I see it all. I must leave this city, though I have a good start. I am a ruined man. I was Dr. J. B. Murphy's intern. I have seen many cases of appendicitis. Dr. Murphy used to say that when there is sudden abdominal pain, first in the epigastrium, then localizing in the right iliac region where there is tenderness on pressure, with vomiting and even slight fever, it means appendicitis. 'Any intern of mine who overlooks a case like that is unfit to practice medicine.' I have overlooked it. I am unfit to practice. What shall I do?" I tried to console him by telling him that I had known Dr. Murphy well and that even he had made mistakes. I assured him I had made errors as grievous as his. The family was told that a perforation had occurred, that an operation was advisable, though it offered little hope. A surgeon to whom I told the whole story went out from Chicago and operated, but the boy died. The young doctor did not give up practice, nor did he leave that city.

Only the active practitioner, who, as Allbutt says, is made at the bedside, can realize what an important role in medicine is played by diagnosis and how often it is some seemingly slight feature that gives the clue. A keen observer of the Sherlock Holmes type may reach a quick decision that astonishes the unobservant man. The lemon-yellow color in pernicious anemia, the "goose cough" of aortic aneurysm, the visible pulse of a leaky aortic valve, a petechial spot on the conjunctiva in bacterial endocarditis, the slurring speech in general paresis, the discolored areola about the nipple in pregnancy—these and other signs

may attract attention and lead to the solution of the problem. Or some seemingly insignificant fact in the past or present history may fit in to complete the picture. It is like working a jigsaw picture puzzle. In this connection I am reminded of an incident related by Brander Matthews He tells of the offensive passenger in the smoking-room of the Atlantic steamer who raucously and with self-laudation gave himself out as a Scotsman, a sailor, a great traveler who had seen and done marvelous things. When he went out, banging the door, there was a moment's hush. Then Laurence Hutton said. "I have no desire to say anything against the gentleman who has just left us—but he is not a Scotchman as he says he is. He says *Edinburg*." Whereupon a quiet little man in a far corner looked up from his game of patience and contributed this "He ain't no sailor, neither. He spits to windward." And then "silence enveloped us," adds Matthews.

In the case of a man with multiple neuritis, both the attending doctor and I were perplexed as to the cause. There was no history of preceding infection, no alcoholism. A slight jaundice made me think of the possibility of a slow poisoning by arsenic. This led to questioning of the wife, and her evasive answers led to the revelation of family dissensions. The doctor therefore was to watch the wife. It turned out that she had been giving him small doses of white arsenic every morning in his coffee. Legal proceedings followed.

In another case of marked peripheral neuritis, in its symptoms typically alcoholic, the husband denied that the wife, who was the patient, took even a small amount of liquor. The doctor was sure it could not be true; the couple were leaders in church and above suspicion. While we were talking in the dining-room, the doctor and the husband were called back to the bedside of the patient. Just then I abruptly said to the maid who was passing through: "Bridget, how much whiskey or brandy does your mistress take a day?" "Oh, I get a quart nearly every day from the drug store." Then, realizing what she had disclosed, "Oh! he'll kill me for this." "Does Mr. ——— know about it?" I

asked. "Why sure, he drinks with her." I announced my discovery to the doctor and the husband, saying I had taken an unfair advantage of Bridget, my sudden question making her think I knew about the whiskey; Bridget was not to be censured. The surprised family doctor asked the husband why he had not told of this. "Because, doctor, I was ashamed to let you know. But my excuse is—if there is any excuse—that we have had financial and other difficulties that have driven us nearly crazy. So we try to drown our troubles in liquor. And, gentlemen"—defiantly—"we propose to drink as much and as often as we please." This was bluff, however. The family doctor succeeded in getting them to change their habits. The woman made a nice recovery. The procedure I adopted in this case is a risky one. Failure might have wrecked my standing with the doctor and the family.

For several years now I have been dubbed a "heart specialist." I think I understand how this term, against which I long fought, came to be applied to me. Even after 1900, when I limited myself to office, hospital, and consultation practice, it was difficult to find time to keep in close touch with all phases of medicine, such as diabetes or affections of the gastrointestinal tract and of the nervous system. Perhaps my old interest in disease of the heart kept me in closer contact with this subject than with others. At any rate, in my reading of the literature of the day, in my clinics, and in published papers this topic was the one most frequently considered. After 1912, when I reported my observations on thrombosis of the coronary artery, I was, willy-nilly, a "heart specialist." I fought against having this term pinned on me, but the name stuck. I resented particularly a sort of corollary that seemed to be implied, namely, that because a man was a specialist it naturally followed that he was incompetent in other fields of general medicine; or, as Hunter McGuire expressed it, that my patients would now suffer from special attention and general neglect. Whatever the reason, I was now consulted less often for an opinion in a suspected Bright's disease, pernicious anemia, tuberculosis, or cancer.

Surprise was sometimes manifested if I ventured to test the knee-jerk or the pupillary reflex in a patient with supposed heart disease. To get permission to exercise what the witty Frenchman called the consultant's prerogative and duty, that is, to examine the rectum, often required persuasion and argument; and the privilege might be refused. What business had a heart specialist to meddle in fields other than his own? One day I gleefully said to my assistant that I had had a grand time. In office, hospital, and the patients' homes, I as a "heart specialist" had on that day seen, with other doctors, six patients for what had been called heart disease. In only two had there been real disease of that organ; one a mitral stenosis, the other a bacterial endocarditis. Of the other four cases, one was leukemia with secondary anemia, heart murmur, and dyspnea. Another was carcinoma of the prostate with metastases in bone and lung. A third was a straight case of psychoneurosis. The fourth case, called a pure valvular disease, was really tabes with luetic aortitis. It seemed like old times. At least, it made me feel comforted to know that though I *had* to be a specialist I still remembered many of the lessons that had been taught by the training and experience of years of general practice as an internist in the broader sense.

Yet I had to admit that, no matter how hard I tried, it was impossible to keep pace with the rapid strides made by medicine and cognate sciences. Much of the newer knowledge, so enormous in its mass, eluded me. There was some comfort in knowing that other physicians were in the same predicament. Everyone had to look for help from others. There was no such thing as playing a lone hand. Most people recognize that economically, politically, and socially there is "One World." A comparable condition exists in medicine with its various branches and specialties. The realistic doctor cannot be an isolationist. The worker in the laboratory cannot solve his problem in physiology without aid from the biochemist and the physicist. The internist in the ward, preparing to report his rich experience with some particular disease, appeals for assistance

to the x-ray expert, the pathologist, the surgeon. This interlocking of interests is reflected in the pages of our medical journals and in the programs of our medical societies. The title of the paper may be simple, but the list of authors generally contains two to five names. From the bibliographic point of view, this is awkward and might well be done away with. Candor on the part of the major author will lead him to acknowledge in the text or in a footnote the names of his co-workers.

What fee to charge for medical service is a knotty problem that is as yet by no means settled and that perplexes all physicians, the humblest general practitioner as well as the highly specialized expert. The doctor has to make his living from the fees collected from his patients, and this puts him in the light of a tradesman. Yet he works, or should work, with the high ideals of medicine as a profession always before him, ever ready to offer help to any sick man, with financial return a secondary consideration; ready to accept what the poor man can or is willing to pay. Many questions arise—what is a proper fee for an office consultation, a visit at the patient's home or a night call; for surgical or obstetrical service; for consultation with one's colleagues? Much depends on the ability of the patient to pay, the time required, the responsibility assumed by the doctor, his professional standing, the type of service rendered.

During my sixty years of practice a marked change has taken place in the matter of fees charged for medical service. In 1889 the ordinary family doctor asked one dollar of the patient who came to his office. A visit at the patient's home was two dollars. Physicians with a richer clientele were charging more. Yet some in the poorer districts were getting as little as fifty cents in the office. Of course, all doctors did a good deal of charity work.

It is interesting to note how differently patients reacted to the doctor's bill. The two wealthiest on my list insisted on having monthly statements, no matter how small the amount might be. Others, though expecting a monthly bill from their grocer or their landlord, resented a monthly statement from the doctor;

it was unheard of. They illustrated the old saying that the last bill to be paid is the doctor's.

There were those who always wanted the bill reduced a little; they had the discount habit. "Jake isn't happy unless he beats me down a little," was the way one doctor expressed it. Some physicians were aware of this habit and prepared for it. Dr. Joseph L. Miller told me that he once expressed surprise that a colleague, after a long service to a patient, had rendered a bill for fifteen hundred dollars. "I know the man is wealthy," said Dr. Miller, "but you don't expect to get that amount, do you?" "No," said his colleague, "I expect to get seven hundred and fifty dollars."

One day a woman paid me in cash the amount of her bill less one dollar. She said she was not asking a discount, did not wish a receipt in full. It was then that I first learned of the superstitious belief that payment of a doctor's bill in full brings bad luck in the shape of another illness.

One morning at two o'clock I was asked to go to a house near by to see a patient of mine, Charlie S., a newspaper reporter who had come home from work, felt pain in his chest, and sent for me right away. There was no evidence of pneumonia, which was what he feared. Charlie wished to settle on the spot and offered me a ten-dollar bill to pay the five dollars that I charged him for the night visit. As I had no change, I told him he could send over the five dollars in the morning. "Doctor," hiccuped Charlie, whose sense of humor was unusually keen when he was comfortably full of whiskey, "Doctor, keep the money. For once in my life I'd like to have the sensation of a doctor's owing me something." Early the next morning his practical wife sent the son over for the five dollars.

As time went on and my work was largely restricted to consultations, my fees were increased. Others besides myself were carried along by the tendency toward specialism and raised their fees. Some, losing much of their sense of medicine as a profession became brazenly commercial and charged all that the traffic would stand.

Dr. N. S. Davis was always a thorn in the flesh to practitioners who wished to raise their fees. How could they do this while Dr. Davis persisted in charging only one dollar for an office consultation—even when the patient came for a first examination or was sent by the out-of-town family doctor for the opinion of the acknowledged leading internist of the Northwest? Many stories were told about Dr. Davis and his "picayunish" fees, and of how in some instances his colleagues got even with him.

Dr. I. N. Danforth told me how a patient from Dakota came storming into Dyche's drug store at the corner of State and Randolph Streets and asked if there was not some other doctor than N. S. Davis to whom he could go; he had not come to Chicago to see a one-dollar doctor, he had a good one-dollar doctor at home, who had sent him here. Mr. Dyche advised him to "go upstairs in this same building and consult Dr. Danforth." While the man was climbing the two or three flights of stairs, Dyche whistled through the speaking tube that communicated with Dr. Danforth's office and told him the circumstances. Dr. Danforth reported to me: "I gave that man a good, honest, thorough examination and the best advice I was capable of. I charged him twenty-five dollars. He was satisfied and—so was I."

There was a well-authenticated story that once Dr. William H. Byford was asked by a lady how he could charge her three dollars for consulting him in his office, while Dr. Davis charged her only one dollar. Dr. Byford quietly replied, "Madam, I am not responsible for Dr. Davis' fees, but I assume he knows the value of his own services better than anyone else."

What should be the basis for fees for out-of-town consultations was often discussed among men doing consultation work. In those days we younger men looked to Dr. Billings, the leading internist in Chicago, as our guide and adviser. He said to me one day: "Herrick, we've got to charge more for out-of-town work. Fletcher Ingals has figured out that unless he charges ten dollars an hour for leaving the city it doesn't pay. In the future

I'm going to charge at that rate." A few years later he was charging—as we all were—much more than that, on the basis of the value of his opinion as an expert, time and distance being of secondary consideration in determining the fee. I recall my first experience in charging on the ten-dollars-an-hour schedule. I had gone to Iron Mountain, Michigan, taking the night sleeper from Chicago. After the consultation, the doctor asked what my charge was, the patient would like to pay me. As the round trip would take twenty hours, I told him the fee would be $200, i.e., ten dollars per hour. As the doctor handed me the check, he said that the man had not protested the amount but he had exclaimed, "My God! That doctor has a lot of nerve to charge $10 an hour while he sleeps!"

Brief reference may be made to an injustice that was prevalent and that even today has not been satisfactorily done away with: the disproportion between the moderate or small fee of the family doctor and the larger, sometimes extravagantly large, fee of the specialist or consultant. This injustice often leads to the pernicious practice of the secret "split fee," which not infrequently means that the consultant or specialist is chosen not because he is the best-qualified man but because he is known as one who gives as a commission a liberal slice of his fee, perhaps forty per cent, to the doctor who calls him. The innocent and ignorant patient is thus unwittingly held up by this brace of commercially minded medical bandits.

The iniquity of this practice lies chiefly in its secrecy. An open presentation of a combined bill would help somewhat. A frankly larger charge on the part of the attending doctor for the conference with the specialist would help. That the family doctor is often underpaid is self-evident. As I was examining a patient one day, I asked the meaning of the large scar in his lumbar region. "Dr. C. T. Parkes left that scar when he removed a stone from my kidney. And by the way, Dr. Herrick, there is something wrong about the system of charging that prevails among you doctors. Dr. Parkes charged me $1,000 for that operation. It was a big fee, but I was able to pay it and did so.

Dr. Henry M. Lyman, who was then my family doctor, charged me only eight dollars for four visits. He saw me in my attack, made several examinations of the urine, correctly diagnosed the condition, advised operation, and selected the surgeon. Why didn't he charge more?" The final answer has not been given. Today, attending doctors do charge more, some much more, some altogether too much. The fact that a patient is a multimillionaire and easily able to pay does not justify charges that are plainly exorbitant. Does not medicine as a profession get a black eye from such a performance?

A partial, not altogether satisfactory, solution of the problem is found in the group clinic, which may be set up as an independent organization or run in connection with a hospital. Here the services of many experts in various lines are secured, generally at a reasonable fee. A single bill is rendered the patient, and the money is distributed on a pro rata basis to the physicians who have had a share in the care of the patient. Some imperfections are inherent in the system; at times the principles of ethics of the American Medical Association have come dangerously near being violated. It is to be hoped that some system will be worked out which will be fair to all—the patient, the general practitioner, the specialist. It is to be hoped, also, that government plans for help in time of sickness, old age, and nonemployment may be carried out by methods that are not ultrapolitical. Otherwise, the valued personal relation between the patient and the doctor of his choice will be lost. The Trojans, to their sorrow, failed to listen when warned of the danger lurking in the wooden horse of the Greeks. A study of past American history should cause the medical profession of today to fear the politicians even though they offer gifts.

CHAPTER IX

Three Great Surgeons

A surgeon is simply a physician who knows how to operate.

POPULAR SAYING

DURING the first of the two decades from 1890 to 1910, I was in general practice, and during the second I was engaged chiefly with office, hospital, and consultation work. It was then that I frequently met two distinguished surgeons, Nicholas Senn and Christian Fenger, and, a little later, J. B. Murphy. It was natural that, when seeking surgical help, I should turn to these men who were my colleagues on the faculty of Rush College and the staff of the Presbyterian Hospital. At times they asked advice of me regarding cases of their own or transferred to my care a patient who needed the attention of a physician rather than a surgeon.

Nicholas Senn (1844–1908) was a Swiss by birth, who went from Wisconsin to Chicago for his medical education. After graduating from Chicago Medical College in 1868 and completing an internship in Cook County Hospital, he returned to Wisconsin, where for several years he engaged in general practice in a rural community. Later he spent two years in the study of medicine at the University of Munich, making a distinguished record. On his return from Europe he moved to Milwaukee, where he became famous as a surgeon and experimental investigator. He was tirelessly industrious. After a busy day of practice, he got at his reading and research, most of which was

done between ten at night and two in the morning. In the 1880's he was made a member of the faculty of the College of Physicians and Surgeons in Chicago. The weekly lectures that he delivered there, as well as the clinics that he later gave at Rush College and the Presbyterian Hospital, where he had succeeded Dr. Parkes, won him loud acclaim. He taught, as did Fenger, what was at the time the new gospel of bacteriology and pathology and their application in medicine and surgery.

Dr. Senn was an omnivorous reader of the latest medical literature. That his wide reading was not always accurate is shown by the following incident. One day Dr. Senn, seeing my intern, Dr. B. M. Linnell, using the microscope, asked what he was looking at. Linnell replied that it was a stained specimen of blood from a patient who, Dr. Herrick believed, had carcinoma of the stomach, a diagnosis in which Dr. Bridge concurred. It must be remembered that this type of blood work was a novelty at that time. So Linnell pointed out various types of cells, remarking that Dr. Herrick thought the increase in the polymorphonuclear white corpuscles made the condition one of leukocytosis, which fitted in with the diagnosis of carcinoma. When an eosinophile was pointed out, Senn exclaimed: "Ah, Ehrlich declares that an eosinophile is proof of leukemia." This was really a distorted interpretation of Ehrlich's words. I willingly consented to Senn's request that he have the privilege of seeing the man, who was a charity ambulatory patient. By pressing hard against the head of the fibula, Senn elicited "bone tenderness so often found in that disease." He showed the patient in his clinic as a case of myelogenic leukemia. A report of the clinic is to be found in the *Chicago Clinical Review*. I told Linnell to keep watch over the man and, if possible, get an autopsy. Linnell did this and found a carcinoma of the stomach. Then, tactlessly but somewhat gleefully at the thought that his attending man was right, he told Dr. Senn of the result of the post-mortem examination. Dr. Senn, not the least disconcerted, replied, "Indeed! very interesting; that is the first time I have seen the combination of carcinoma and leukemia."

Medicine was Senn's mistress, and he was her slave. He had few avocations except travel and travel-writing during vacation. The theater, opera, cards, social functions, polite literature, had little attraction for him. He seemed to take himself seriously and lacked a sense of humor. Yet once—perhaps it was the extra highball that loosed his tongue and verified the adage "in vino veritas"—he said half-jocularly to a younger doctor, who protested that he didn't know enough to be a surgeon, "Why, Jennings, it's easy. All you have to do is to cut the soft parts and saw the hard parts, of course, giving due consideration to the vascular and nerve supply." He had few intimates. Though I met him often, on only one occasion did we speak to each other as man to man. In that one-hour chat, however, when he laid aside his mask and dropped the role of actor, I learned that there was in him, as there is in nearly every person, something distinctly human. He was alert to the meaning of current and past events and revealed an insight into the ability and personal character of his colleagues that was astonishing.

Senn was able to accomplish so much in each day's work because he was systematic. He was prompt at college and hospital appointments, was always on time at a consultation. Although in a lecture his flow of language seemed endless, when he was called by a colleague to see a patient he wasted no time in idle gossip or needless shop talk; he attended strictly to the business of reaching a diagnosis and outlining treatment. He was sympathetic with the patient, courteous to the attending physician whose interests he was careful to protect, answered questions frankly, and then, with no appearance of hurry, left the house. His charges for consultation were reasonable. He sent in his own bill, usually within twenty-four hours. There could be no question in anybody's mind of a split fee.

Dr. Senn was a fluent talker, always with a flair for the dramatic. He could hold in unabated interest for two to four hours an audience of three hundred to five hundred students and physicians, who crowded the college amphitheater to hear him. His lectures and clinics were by no means wholly didactic in

character, based entirely on theory or on his encyclopedic knowledge of medical literature. They were full of common sense and abounded in practical lessons. To see in one afternoon cases of tuberculosis of the hip, knee, testicle, pleura, kidney; to hear the pathology of tuberculosis scientifically discussed, to see active treatment of this disease by use of knife, cautery, splints, casts, to watch the progress of patients that had been shown before, all this, dramatically portrayed, left lasting impressions on hundreds of men who, years later, testified to the value of the lessons inculcated by these big "show clinics," as they were sometimes sarcastically called.

He introduced pedagogic novelties. At one of his lectures on surgery of the bowel, there were brought into the lecture room several large pans filled with fresh, cleaned pig's intestines. Each student was given a short piece, together with needle and thread, and had to practice uniting the cut ends of the gut with the appropriate stitch—I believe it was the Lembert suture. This may have been sensational, but it stirred up many of the boys to practice the stitch at home on socks or shirt sleeves or on pig's gut which they themselves obtained from the Stock Yards.

On another occasion, when the subject under discussion was fractures of the skull caused by bullet wounds, a cadaver was brought into the arena, and Dr. Senn boldly squared off and with a big army revolver fired at the skull. To show the effect of shots that struck the bone at different angles, he fired so as to strike the skull obliquely. When the bullet ricocheted and fragments went pinging among the upper seats of the crowded amphitheater, even Dr. Senn concluded that a little more caution was advisable. It was a dramatic display, but certain facts that he brought out were indelibly fixed in the minds of the students.

Other incidents illustrate the value of his advice, which was based on his encyclopedic knowledge of literature and his extensive experience. One day a practitioner brought to the clinic a boy whom for several months he had been unsuccessfully treating for osteomyelitis of the tibia. The story was that, while

the boy was climbing a fence, a board had broken and the sharp end had penetrated the leg. The doctor hoped Dr. Senn would admit the patient to the hospital where the dead bone—the sphacelus—could be removed. Dr. Senn listened attentively to the story. Then, while he was carefully examining the wound with his finger, he suddenly stopped and, still keeping his finger in place, asked for an artery forceps. "Perhaps I have the *corpus delicti* which may not be dead bone." Following the finger as a guide, he withdrew with the forceps a tough, sharp splinter of wood. He gave a few directions to the doctor as to the treatment of the wound, requesting him to return in a month if healing was not satisfactorily taking place. Then there was a short practical talk on overlooked foreign bodies as a cause of failure of healing of wounds of bones and other tissues of the body. No doctor or student could witness the scene and listen to the comments without being taught an unforgettable lesson in practical surgery.

A physician from one of the suburbs told me how, when he discovered on his son's big toe a tumor which the boy said had lately increased in size, he jumped to the conclusion that the growth was malignant, probably a sarcoma. Greatly alarmed, he consulted Dr. Fenger, who diagnosed sarcoma and advised amputation at the hip joint. Dr. J. B. Murphy gave the same opinion, though he said it would be wise at the time of operation to confirm the diagnosis by study of a frozen section.

In despair the father went to Dr. Senn. "It was a hot Sunday; I rang the bell of his residence. Dr. Senn in his shirt sleeves opened the door, explaining that the servants and others of the family were at church. I apologized for intruding on Sunday. He invited me into his library, made me feel at ease by chatting about mutual acquaintances in Wisconsin. When he looked at the toe he exclaimed, 'Ah! a rare condition, subungual osteoma! I have seen only one other case. Bland Sutton has two specimens in his museum in London and I believe has a picture in his book on *Tumours*. We can easily remove it by a simple operation and save most of the toe." This operation was later successfully per-

formed. "Dr. Herrick," the doctor said to me, "you may talk as much as you wish of the pre-eminence of Fenger and Murphy, but Nicholas Senn is good enough for me." Here again were illustrated Senn's encyclopedic knowledge and his ability to apply it practically. There was also manifested an understanding of people and a tact and a sympathetic touch with which he was not always credited.

Dr. Senn's avocation was writing and travel. He published many articles and monographs, such as the one on the pancreas. His textbook on *Tumors* and his *Practice of Surgery* had a great vogue for several years. He wrote on military surgery, in which he was greatly interested. During the Spanish-American War he had been on active duty at the front. Some articles were timely and served a good purpose, though they were in general hurriedly written, in a measure compilations and repetitions. In Fulton's *Harvey Cushing* reference is made to the fact that Cushing had made good use of his well-worn copy of Senn's *Tumors*.

Dr. Senn's favorite traveling companion was the neurologist, Daniel R. Brower. How these two men, so different in their makeup, became boon companions has always been a mystery to me. Nearly every year their vacation was spent in trips to distant lands—Alaska, Russia, the Orient. Dr. Brower always went with a liberal supply of books with which he passed the time. Dr. Senn once told me how Brower tried to interest him in a novel by S. Weir Mitchell. "I got along pretty well for about twenty pages. Then Mitchell describes a French duel. I threw down the book in disgust; Mitchell never saw a duel in his life; he was just drawing on his imagination." Facts were what Senn wanted.

After nearly every one of these trips, Senn published a book describing the countries seen and giving his observations. I cannot vouch for the truth of the story, but it was said that a fellow-passenger, while in the writing-room of the Atlantic liner, happened to read a page of Senn's manuscript: "We can now see from our car window the Russian peasants working in these

broad Siberian fields, etc." A Baedeker was close at hand. Another characteristic of his travel writings and public addresses was the rich assortment of quotations with which his pages were sprinkled—Latin, Greek, French, English. One wondered what book of quotations he owned.

After an attack of what was called "angina pectoris," which would today be recognized as coronary thrombosis, against the advice of physicians, he went to South America, where he gave out while climbing the Andes. He reached Chicago dyspneic and waterlogged, and died January 12, 1908, in his sixty-fourth year.

Dr. Senn's contribution to medicine was great. By precept and example he taught hundreds of students and practitioners the principles and practice of advanced surgery. He stimulated many to become better acquainted with medical literature and to recognize the importance of research.

Nor should it be forgotten that he made substantial contributions to medicine in the form of money. Among his gifts to Rush College was one of $50,000 toward the erection of a building, which was named Senn Hall in his honor. He purchased the physiological library of Du Bois-Reymond, of Berlin, and that of Professor Baum, of Göttingen, and gave them to Newberry Library, adding many volumes from his own shelves. The "Senn Room" at the Crerar Library, which later acquired the medical collection of the Newberry, perpetuates this act of generosity. One of his ardent admirers is quoted as saying, "Nicholas Senn, as a man, has done more for the medical profession than all other physicians combined who have ever lived in this great city." An extravagant statement, yet with much truth in it.

It seems surprising that with all his talent and unsurpassed industry and with his many contacts with students, interns, assistants, and colleagues, he left no successors that as a group inherited and kept alive his influence. One does not speak of a Senn "school" as one does of a Gunn, a Fenger, or a Frank Billings "school." The reason? Is it not that Senn gave of his

knowledge and his worldly possessions rather than of himself? He failed to touch the heart, out of which are the issues of life. He left behind admiration, but not the affectionate devotion of a group of followers.

The story of Christian Fenger (1840–1902) is different. He came to Chicago in 1877. He had a better background in the way of inheritance and training than could be claimed for other Chicago surgeons, excepting perhaps Daniel Brainard, since he came of cultured Danish stock. In the schools of Denmark he had been well educated in arts and sciences and had mastered several languages. He was thoroughly grounded in physiology and had had practical experience in surgery gained in the field during the Schleswig-Holstein war and while serving with the German army in the Franco-Prussian War. He had investigated tropical diseases and trachoma in Egypt. He was familiar with the gross pathology of Rokitansky and counted his post mortem examinations not by the hundreds but by the thousands. Imbued with Virchow's doctrine of cellular pathology, he had become an expert microscopist.

On his arrival in Chicago he secured a position in the County Hospital. Though not a bacteriologist, he believed in the germ theory and introduced Listerian methods. His superior ability was at once recognized; and the best among both students and physicians listened eagerly as he expounded what were to them new facts and new methods of thought and practice. They became his faithful disciples because it was plain that this man, though simple in dress and manner and slow and halting in speech, was inspired by the desire to help others, not to glorify self.

It was my good fortune as an intern to have Dr. Fenger as attending man in the County Hospital and to be in close touch with him later, especially when for several years he was on the staff of Presbyterian Hospital and a member of the faculty of Rush College. The relation of a few incidents that occurred in these years may reveal some of his characteristics. Others, as well, could tell such tales, for no Chicago physician of that day

who knew him but was ready to relate "the best one yet" that illustrated the eccentricities, the knowledge, and the friendliness that made him the beloved physician.

Once, in the County Hospital, he was operating on a case of hernia. He was evidently puzzled over the anatomical landmarks. Suddenly his face lit up and he exclaimed, "I know now; this is the properitoneal hernia of Krönlein; I will tell you about it when we finish." He accidentally cut the spermatic cord or *funis*, as he called it. "Too bad," he remarked, "but he has a good one on the other side." After the operation all the assistants went with him into the dressing-room. It was a sight to see Dr. Fenger smoking his cigar, interrupting his dressing to explain to us the peculiarities of the hernia described by Krönlein, drawing it in diagram on paper—he was an expert at this—walking about the room, answering questions, and slowly getting into his clothes.

There were many such occasions. On one, absorbed in talking pathology, Dr. Fenger accidentally put the webbed knee-bandage that he wore, on the wrong knee and had to undress and fit it on the proper one. Surely, we boys were receiving inspiration and education from contact with such a personality.

Another incident that grew out of this case is fixed in my memory. A man with a large hernia had come in asking—almost demanding—operation. Dr. Fenger, because he planned to go soon on a vacation, said he could not operate and remarked, "Let him wear a truss."

"He has worn one for several years," I replied, "but the hernia has become larger and the truss is very unsatisfactory."

"Let him get another one. I have no time for him."

"But," I insisted, "he is a Scandinavian."

"Well, even if he is a Scandinavian, let him wait until I come back."

"Perhaps," I hinted, "someone else might operate. It seems like a simple affair, though the hernia is very large."

Dr. Fenger stopped—we were walking through the corridor—and with a knowing look and a twinkle in his eyes he said,

"Ah, I understand. *You* wish to do the operation. Ja, do it; do it exactly as you saw me do it the other day. But," shaking his finger at me with the pretense of a threat, "if *you* cut the funis you will be fired."

You could not help loving one with such kindliness, such a sense of humor, such knowledge of human nature. And his tacit acknowledgment of regret at the mistake in cutting the cord blotted out any censure I may have registered for his seemingly casual reference to the accident at the time of operation.

In the Presbyterian Hospital he once asked me to look at a ward patient upon whom he had operated ten days before, saying he feared she had developed pneumonia. The next day I tried to report my opinion to him privately, but he gave no opportunity for privacy. He repeated his question regarding possible pneumonia, in the presence of several interns.

"Dr. Fenger," I said, "there seems to be a diffuse process that might perhaps be regarded as bronchopneumonic in type."

"Will she get well?" he asked.

"I fear not," and edging closer to the crux of the matter, "was it not for tuberculosis that you resected the hip a few days ago?"

"Yes." Then after a moment of hesitation, a long-drawn "Ah-h-h! I see what you mean. Oh, my thick head," pounding it with his clenched fist. Turning to the interns who did not understand the cryptic dialogue, "I hope, if Dr. Herrick has time, he will tell you about miliary tuberculosis. You will learn something." He was chagrined not because he had, after examination, thought the complication was pneumonia; he was disgusted because with all his knowledge of pathology he had not promptly suspected the possible relation between the lesion in the hip and the one in the lung. One might appropriately comment on the manner in which, if there has been a mistake in diagnosis or treatment, some internists and surgeons get out of the embarrassing difficulty by a frank admission of error, which was Dr. Fenger's way, while others, not exactly telling an untruth, wriggle out of the situation by keeping mum or by telling only a part of the truth.

Dr. Fenger was not alone ethically honest, he was intellectually honest. He possessed this gift of straight thinking to an unusual degree. Yet, paradoxically, it led him at times into embarrassing pitfalls. Before reaching a conclusion as to diagnosis or advisability of operation, he wished to know for certain all the minutiae involved in the case. Sometimes these facts escaped even most painstaking investigation, and Dr. Fenger would hesitate or delay, illustrating the truth of Hippocrates' apothegm that judgment is difficult. At times it seemed as though he was almost "suffocated by erudition." A statement made by Mr. Justice Cardozo expresses the thought. "There is an accuracy that defeats itself by overemphasis of details."

Dr. Fenger advocated and practiced thoroughness; he meticulously evaluated symptoms and signs, reviewed pertinent literature, and considered indications for and against various methods of treatment. In accord with his belief in thoroughness, some of his operations were marvels of completeness, for instance, his removal of tuberculous glands of the neck or carcinomatous glands in the axilla. But at times his zeal for thoroughness ran away with good judgment. I shall later tell how Dr. Murphy at a consultation accounted for his own success in operating for ruptured appendix· "If the appendix presents in the wound, I take it out; if not, I leave it alone. I put in a drain and quit; get in and out as quickly as I can." A few days after the consultation with Dr. Murphy, Dr. Fenger had me see a woman on whom he had operated for perforative appendicitis, his eighth case, he said. He was very anxious to have her get well; which would make his record 50 per cent recovery—"not bad," he added. Then he told me of the thoroughness with which he had operated; how he had made a large incision; had, after a long hunt, found and removed the stump of the gangrenous appendix; how he had several times irrigated freely the entire peritoneal cavity, tucking iodoform gauze drains into every corner where there might be pus pockets among the coils of intestine! No wonder one of his most ardent admirers and loyal students, Dr. T. A. Davis, who had for a long time been his

clinical assistant at the College of Physicians and Surgeons, confessed pithily, yet sadly, "Really, Dr. Fenger is too thorough a surgeon for the abdomen."

Another case illustrates this characteristic of being overthorough. In the 1890's he removed for me a large mildly toxic goiter from a woman of about thirty-five. Those were the early days of thyroidectomy, days when the importance of gentle manipulation of tissue and the necessity for rapid work were not clearly recognized. Dr. Fenger had evidently thought much about the technic, for he made elaborate preparations. Two artist's easels were brought in and placed one at his right, the other at his left. On one was Gray's *Anatomy*, on the other drawings he had copied from Kocher. He himself sat during part of the operation. As the muscles and other structures came into view—it was a beautiful anatomic demonstration—an assistant turned the page of Gray or put the next Kocher drawing where he could see it. He explained the importance of leaving some thyroid tissue, because of the danger of operative cachexia strumipriva. Therefore, he would not touch the smaller lobe, but the larger one was to be removed completely. Slowly, methodically, he worked. Then to my astonishment and horror he began to dissect out the recurrent laryngeal nerve, grasping it repeatedly with a dissecting forceps, while with another he picked off bits of thyroid or fat until it lay fully exposed, naked as a leafless branch in winter. "There," he finally said, "now I know where that nerve is and that I have not cut it." The operation was long and tedious.

The next morning I went quite early to see my patient. I asked how she felt. She replied in a raucous voice, "Pretty well."

"Dr. Fenger has not yet seen you?"

"Yes, he came very early."

"What did he think of your condition?"

"I don't know. He is a strange man and I don't like him."

"What did he say or do?"

"He felt my pulse and then said, 'Let me hear you sing.' I

said, 'What?' And he said, 'Say Ah.' I said 'Ah,' " she whispered hoarsely, "and then," she added, "he swore awfully: 'God damn it to hell!' and walked out." She added that she didn't know what he meant or why he was mad at her, but that he was not a gentleman.

Well, I knew what he meant, and I read into it his guilty feeling that perhaps he had been overthorough in his handling of the recurrent laryngeal nerve. I saw this patient again after an interval of more than thirty years. She marveled when I said I remembered her and her case very well, proving it to her by citing the "let me hear you sing" incident. She was mildly hypothyroid, but had a good voice and was in fair health for one of her age.

One other incident illustrates the value of Fenger's habit of thoroughness and his frankness in admitting error. The hour had been set for the removal of the right kidney for hypernephroma, and the patient was on the table, with nurses, interns, and anesthetist waiting Dr. Fenger's arrival. He came in an hour late, said he had thought the matter over in the night and was convinced that the unilateral edema of the leg meant that the tumor had invaded the vein and operation would be useless. Friends of the patient were indignant because of the long delay. They probably forgave him when the autopsy showed that his second thought and his interpretation were correct.

Much more could be said of his personality. He was cultured and refined; an unusually good judge of paintings and sculpture. He was humble, not puffed up; was willing to learn from younger men. He was essentially gentle and kindly, yet capable of wrath when his motives or his views were, as he thought, unfairly attacked. On one occasion he was loud in his denunciation of the faulty asepsis in a case that had been treated at the Presbyterian Hospital. When, at the County, old rotten catgut broke and a fatal peritonitis resulted, he exploded in angry imprecations against the catgut, the niggardly policy of the hospital officials in failing to provide good material, and against himself for foolishly using the bad ligatures. The scene reminds

me of what a recent writer calls the "triple-bound curse" of Chaucer. In the Friar's Tale the wagon with a load of hay is stalled in the mire. The carter curses not only the horses, but the cart and the hay: "The devel have al, bothe hors and cart and hey."

The two Chicago surgeons who for many years were most widely known in this country and abroad were Nicholas Senn and John B. Murphy, both of whom, by the way, always acknowledged their indebtedness to Christian Fenger. They were great teachers and practitioners of surgery, as well as investigators. Why did Senn and Murphy leave as successors no group that can justly be called the Senn or the Murphy "school"? Why was it that Fenger left what is often referred to as the Fenger "group" of pathologists, surgeons, and physicians? Senn and Murphy were eagerly listened to by thousands of students and practitioners, by many more, in fact, than heard Christian Fenger. Doctors still tell of the lessons they learned from Senn's dramatic amphitheater clinic or Murphy's Socratic method of teaching. But there was something lacking in these two, a something that Dr. Fenger possessed. It is difficult to express it in one word. Was it not largely humility, effacement of self, a sincere effort to work not for the sake of personal glory but to help the other man? Reward for Fenger came not in a reputation for brilliance as an operator or teacher. His reward was the respect and affection of the student, who recognized that the master was giving of his best to help another. His life was proof that it is more blessed to give than to receive. Dr. Fenger's glory is that he made to medical Chicago and the Northwest the gift of a group of physicians, whom he activated to a modern conception of pathology, to more scientific ways of thinking, and to a form of practice in which the standard of success was intellectual honesty rather than financial return or reputation as brilliant teacher or operator. The transmitted influence of this group—the Fenger school—is still at work. It will never die.

Dr. Fenger had lived in Chicago for twenty-five years when he died of pneumonia at the age of sixty-two on March 7, 1902.

He was just beginning to become a national figure, known through contributions to the surgery of the gallbladder, the kidney, and the pelvic organs. The huge dinner given him by his Chicago friends in 1900 had attracted much attention to the fact that here was a prophet who was accorded honor in his own country, for he was looked upon as the most commanding medical influence in his community.

In March, 1902, at the request of the editor, I wrote for the *Journal of the American Medical Association* an unsigned obituary notice of Dr. Fenger. As I read it today it seems long, wordy, and rhetorical, but it has the ring of sincerity. If it correctly revealed the sentiments of the large group of those who revered Dr. Fenger, it goes far to prove the correctness of a statement made by Dr. W. A. Pusey that Fenger was "canonized" by his followers. The article was written when I was forty-one years old, when I was under the emotion aroused by having been a witness of his death—a beautiful, heroic death, I would call it, with its revelation of the ideal, loving companionship that had existed between him and his wife for many years. The incidents of that week when Frank Billings, Harry Favill, and I kept constant watch over our friend and guide, are too sacred to be revealed. Yet today, after more than forty years, at the mention of his name my heart again responds with a quickened beat and my eye grows misty; again I see before me the simple, plain man with his kindly smile and cordial greeting. In memory he is still the great, the learned, the wise surgeon, beloved not because he was a superhuman but a very human being, a man who, as John Buchan said of another, was greater than any of his achievements—in fact, whose personality was in itself his greatest achievement.

Though younger than Senn and Fenger, John B. Murphy was their worthy colleague. For several years these three were regarded as the most distinguished surgeons of Chicago and the Northwest.

Dr. Murphy was usually spoken of as "J. B." Of humble

Irish parentage, with only a high-school education, he came to Chicago from Appleton, Wisconsin. In 1879, at the age of twenty-two, he was graduated from Rush Medical College. After completing an internship in the County Hospital, he spent nearly two years in study abroad in Vienna, Berlin, Heidelberg, Munich, and London. On his return he became associated with a wise physician, E. W. Lee, who was, incidentally, well versed in the ways of local politics. At once Dr. Murphy started on a medical career that was meteoric, dazzling, puzzling.

No surgeon of his day was given greater credit for his service to medicine: witness his pioneer work on appendectomy; his surgery of blood vessels, joints, tendons, intestinal tract, and lung; and the "Murphy button." Will Mayo called him "the surgical genius of our generation." I have described how in 1894 I ran across Murphy in Berlin, and with him visited Von Bergmann's clinic. Murphy, at that time only thirty-seven, was on his way home from Rome, where he had, on invitation, presented a paper before the International Medical Congress. Surely, a great honor for a self-made man, only eleven years in practice.

Almost from the first he was connected with hospitals and medical schools. In 1887 he was lecturing in the popular spring course at Rush. Then, in succession, he was on the faculties of the College of Physicians and Surgeons, Northwestern, Rush again, and finally back at Northwestern, where he remained until his death in 1916. For many years he was chief surgeon at Mercy Hospital, where much of his best work was done. Largely through his efforts, this hospital was enlarged and its management, nursing, and educational features improved. In the office of Mercy Hospital there are to be seen pictures of the strange trio that made that institution famous: N. S. Davis, Sister Raphael, and J. B. Murphy—and "J. B." was not the least of the three.

My first experience with Dr. Murphy was when, in 1887, in the "spring course" at Rush I elected his lectures on "Surgery of the Bones and Joints." He was a stimulating, forceful lecturer and always held his audience. On the advice of someone—

possibly it was Weller Van Hook—I had purchased a copy of Billroth's *Surgical Pathology* and had become deeply interested in it. What was my surprise to hear Murphy following Billroth so closely that at times he almost recited him word for word. Not once was any acknowledgment made of his debt to this volume. The lectures, however, were by no means merely Billroth; Dr. Murphy showed us gross and microscopic specimens of diseased bones and cited his own cases.

I made careful notes and marked special passages in my copy of the *Pathology*. The examination question was "Describe the pathology, diagnosis and treatment of tuberculosis of the knee joint." To have a student in examination repeat the substance, almost the very wording, of the lecturer may not be evidence that the student has been taught how to think independently, but it shows he has listened—and it flatters the instructor. So when I handed in a paper that repeated almost verbatim his own words, with citation of his own cases, with a drawing after Billroth, he marked me 7+. This was decidedly high, for 7 was regarded as perfect. Dr. Murphy said to the college clerk, "Do you know a student J. B. Herrick? Well, tell him for me to be sure to try for the County examination. He writes the type of paper that will win." It was a kind and thoughtful act. I wondered then, as I do now, why he had not recommended to the class that they consult Billroth's book, telling them of its helpful nature and frankly admitting that he was closely following it in his lectures.

In hospital and college he taught especially by means of the clinic. In spite of a disagreeably high-pitched, rasping voice and a marked nasal twang, his success as a teacher was phenomenal. Students and visiting physicians crowded his clinics, conducted after the Socratic method of question and answer. He got a student and a patient together in the arena and quizzed both of them. The patient was made to recite the history and to answer questions as accurately as possible; the student had to tell what he saw with his eyes, heard with his ears, felt with his fingers, and to declare what the symptoms and signs meant. Murphy

would snap, "Yes, sir, but *why?*" Or "No, sir, you are wrong, and I'll tell you why." Dr. N. C. Gilbert tells how Dr. Murphy used to shake his finger in the students' faces and say in his shrill voice, "Listen, listen to the patient's story! He is telling you the diagnosis." Lessons taught in this dramatic way never failed to make an impression. And it should be added that his pointed criticisms of students never left a sting, even though the young men might be shown up as none too bright. I know of no one who excelled Murphy in this particularly effective style of teaching; it was unique. Again to quote Will Mayo. "In his teaching of clinical surgery, Murphy was without a peer."

Dr. Murphy was a keen diagnostician. At times his judgment about the nature of an illness or the advisability of operation or its technical details was almost uncanny. His expertness as an operator was equaled by few. When he and his one-time assistant, James Neff, worked as a team, ligatures, sutures, forceps, and retractors were always in the right place and on time. The brains and fingers of surgeon and helper fairly clicked in their machine-like accuracy of movement.

That Dr. Murphy's success was largely dependent on native ability is true. But it should not be forgotten that success came to him because of hard work. In spite of physical infirmities—in his earlier years he was handicapped by an obscure fever probably due to an infection of the kidney that was by some thought to be tuberculosis—he worked to the limit. "My sign to stop for a time," he once told me, "is when I am irritated and cross when I see another patient come into the office. Then, usually twice a year, Mrs. Murphy and I run away for a month or six weeks." "And," he added, "that rest is always a good financial investment, for I can do twice as much in one day after I return refreshed, as when I went away tired." And in his later years his clientele of private patients was enormous. One reason he could handle so many was that he was not only a rapid worker but systematic and wasted little time.

Mrs. Murphy exerted a powerful influence over her distinguished husband, of whom she was proud. She was a beauti-

ful woman, ambitious that he should have recognition as a leader in society and in financial circles as well as in the medical world. So she saw to it that his name often appeared in the society column of the daily press. She censored all bills that were made to patients and was responsible for many sizable increases in fees. She watched over his health, guarding against overwork and insisting on vacations. She was with him in his courageous fight against illness—the renal trouble with its alarming hematuria, the suspected tuberculosis, the attack of typhoid fever, the relentlessly advancing anginal evidences of coronary disease. Lovingly, devotedly, Mrs. Murphy stood by him to the last.

His path to success was by no means smooth; he was always getting into trouble. Patients cited specific instances to prove that he was commercial. He was severely criticized by members of his own profession. That much of this lay and professional criticism was unjustified may be taken for granted. The poison tongue of calumny rarely fails to exaggerate and to harm far beyond what is warranted by the facts. Yet "J. B." had certain traits that caused him to do things that rendered criticism inevitable. He was inordinately ambitious for a large practice, for position and wealth. To these ends he pulled wires—political, social, medical, personal-friendship wires, sometimes in ways that seemed questionable to many. In his eagerness for applause he might play to the galleries. He knew the value of newspaper publicity and was an expert in securing it. This in the eyes of many was nonethical advertising, though some critics who threw stones at him forgot that they were living in glass houses. He was not always careful about taking credit for what some other man had done before and none too considerate, it was alleged, about taking another doctor's patient.

So he was often in hot water. He was long refused admission to, or was humiliatingly called before, ethical committees of, local and national medical societies. Yet he managed to squirm out of the ethical nets. By shrewd manipulation, in 1911 he was elected president of the American Medical Association, an act that brought with it the lasting, bitter antagonism of some of

the leading men in that powerful organization. His biographer, Loyal Davis, who aptly terms him the "Stormy Petrel of Surgery," while defending him for much, frankly admits that "there was good and bad in this man—and in abundance on both sides. . . . There was ambition with all of ambition's ugliness as well as its beauty."

From Cook County Hospital days to the year of his death I saw much of Dr. Murphy. Even after he left Rush and the Presbyterian Hospital, our paths frequently crossed. From a rich store of memories I select a few incidents that may illustrate some of the characteristics of this remarkable man.

I have referred to his almost uncanny judgment as to when not to operate or when to go no further in an operation. From a neighboring state there had been sent to me a boy whose appendix had ruptured about ten days before. I asked operative help from Dr. Murphy. As best he could he cleaned up the mess in the right iliac fossa, putting in drainage tubes, etc. Then, carefully palpating in the left flank, he said: "There is an abscess there, but I am going to leave it." Surprised, I mildly protested—should not pus pockets be drained wherever they were found? "Dr. Herrick," he said, "when I made a rectal examination before this operation I felt this bulging abscess. I believe it will break into the rectum very soon. Nature can do a better job of draining than I can." His prediction was correct; within a few hours the abscess broke. The boy made a good recovery. The old adage used to be "meddlesome midwifery is bad." Dr. Murphy was one who seemed to have an inborn sense of knowing when meddlesome surgery was bad.

Once he asked me to look at a man with a ruptured appendix on whom he had operated. He said it was his twenty-third case of this kind without a death. Could I make out any other cause for a continued fever than the abdominal condition? I could not. He answered my question why he was so successful in these cases by saying, "At operation I get in and out as quickly as I can. If the ruptured appendix comes into view I take it out; otherwise I just put in a drain. After operation I prop the patient up in the half-sitting Fowler position. I leave a lot to na-

ture." This getting back to the old Galenic belief in the *vis medicatrix naturae* on the part of so deft an operator as Dr. Murphy was a remarkable trait, especially at a time when the knowledge of bacteriology and asepsis had let loose a furor—almost a pandemic—of operating.

A memorable event was a trip with Dr. Murphy, arranged by the lumberman, Edward Hines, in a special train, to the northern peninsula of Michigan to see a friend of Mr. Hines who was seriously ill. We arrived in the little village at four in the morning. A persistent fever of obscure origin, with local symptoms of inflammation in the left iliac region, led us to suspect pus. Dr. Murphy was so sure of pus that he made a search for it with an exploring syringe. As I saw him slowly push the big needle deeper and deeper into the flank I fairly shuddered, fearing he would puncture an artery or vein. His knowledge of regional anatomy—and his nerve—stood him in good stead, however; no accident occurred. No pus was found. "Get busy," said Dr. Murphy, "wrap the man up and all of you, wife, nurse, doctor, get into our special car which is on the side track. We'll take Mr. N. to Mercy Hospital in Chicago, where we can watch him carefully." The details of the trip; the personal reminiscences, as we went through Dr. Murphy's old home territory in Wisconsin; the long, tedious illness with a most extensive migrating thrombophlebitis of the lower extremities and of the abdominal wall, with enormous edema, the futile attempt to locate pus by an operation; and the final recovery, after many weeks, need not be gone into here. Almost daily, Murphy and I met on the case. I couldn't worm my way into the hidden corners of his mind and get from him a diagnosis. When, however, the man recovered, I put the direct question: What was it? "Dr. Herrick, all the time I felt it was a left-sided appendicitis with rupture, as the event, I think, shows was the condition." I could not help wondering why, if he were so certain, he had not been free to tell me about it earlier. Was he waiting to see which way the cat was going to jump? Today, the case would be diagnosed by any hospital resident as diverticulitis.

Another incident may be recorded as amusing and instructive.

I had diagnosed a lumbar abscess—peri-nephritic, so-called—located the pus by means of a small aspirating syringe, and asked Dr. Murphy to operate. He suggested that it would be a fine thing for the students if he and I could present the case together in clinic, after the manner of a consultation. This we did. After I had given the history, Dr. Murphy asked me to point out exactly where I had inserted the needle. He did not question my diagnosis but wished to confirm it by using his own needle, which would also serve as a guide to him in operating. He then inserted one of his longer and larger needles but failed to get pus. He turned to me and said, "Dr. Herrick, how is this? You say you got pus at this point. I don't. What is your explanation?" On my mettle, my face burning, I replied rather testily, "You are probably using a plugged needle." He examined the needle and sure enough it was plugged from rust. Turning to the students, Dr. Murphy said, "I think Dr. Herrick's diagnosis of the reason for the dry tap is as brilliant as his recognition of the abscess which I believe is there." Then, with a somewhat sly, quizzical look, he added, "Now I'm going to let all of you into a secret. I never go to a case without *two* exploring needles. One may break or be plugged, as this one is, from carelessness in cleaning. Let me have the other needle." Then he withdrew pus, confirming the diagnosis, and operated. I have never been sure that he didn't put up a game on me and purposely use a plugged needle to see if he could make me back down from my diagnosis, and also to enable him to teach in this rather dramatic way a valuable lesson to the students.

His keenness in observing and interpreting signs of disease was matched by his keenness in observing and interpeting the reaction of his words on patients and their friends. At the end of a consultation we had agreed that the well-to-do man had a stone in the left kidney and needed operation, which Dr. Murphy said he would do the next morning at Mercy Hospital. The son of the patient, a man of about forty, asked what the charge would be. Dr. Murphy promptly replied, keeping that steel-blue eye of his fixed on the questioner so that he never missed the

slightest change of countenance. "The fee will be three hundred and fifty dollars." Then, seeing no unfavorable reaction to this sum, he quickly added, "Of course, Mr. S., this fee assumes that the stone is in the kidney; if it is in the ureter I shall have to charge more." Several months later I asked Dr. Murphy how the patient had gotten along and was told he had made a good recovery. "You found the stone in the ureter, did you not?" I rather wickedly asked. He caught my meaning, but didn't seem to see anything witty or humorous in the remark. In fact, I think I barely escaped a tongue-lashing which perhaps I deserved. It was one of the cleverest tricks of trying to find what the traffic would bear in the shape of fee that I have ever known. Dr. Murphy once told me on another occasion how he was consulted by the wealthy father of a multimillionaire as to what his charge would be for operating for appendicitis on his son. "I missed a good chance," he said to me, "I told him $5,000. In spite of the old gentleman's tears I ought to have asked ten thousand."

The last time I saw Dr. Murphy was a short time before his death. I met him just as he was leaving Mercy Hospital. It was generally known at that time that symptoms of angina pectoris had appeared. So I expressed surprise that, contrary to the advice of his physician, Dr. Charles L. Mix, he was not resting but working. Dr. Murphy replied that he had merely gone to the hospital to see a few patients, he had done no operation. In a few days he was going for a long rest to Mackinac Island. Then the familiar shrewd smile lighted up his face as he said as though confiding to me a secret, "Dr. Herrick, I would rather be careful now than have a big funeral." Alas, in spite of care, the sclerotic arteries of the heart made good their threat, and on August 11, 1916, he died at Mackinac of a most painful heart attack. The diseased heart found at autopsy and the old lesion in the kidney bore mute testimony that the Stormy Petrel of Surgery had for long put up a courageous, though losing, fight against an unconquerable foe.

He had a big funeral. His admirers, friends, colleagues, and

patients erected in his honor the magnificent John B. Murphy Memorial Auditorium on the North Side in Chicago. It was a well-deserved tribute to a great surgeon.

Why did this brilliant man so full of energy, so resourceful, so gifted with the earmarks of genius, fail to leave worthy successors? Why did he fail to hold many of his best assistants? Why did so many of his colleagues, who were loud in their praise of his ability as an investigator, operator, and teacher, avoid close association with him? One of those colleagues remarked to me, "Murphy is a great man, deserving of highest praise, but I don't care to sleep with him." Why was all this? I believe it was because Murphy gave little of self. He used men and knowledge and opportunity as tools or agents for his own ends. He gave not of self but to self. There is no Murphy "school "today.

CHAPTER X

Teaching in the Medical School

Every one has the right to expect that a considerable part of the labour of the master shall be employed in moulding pupils to succeed and surpass him.

SANTIAGO RAMÓN Y CAJAL

NO SOONER had my internship ended than I began to teach. This continued for about forty years, at the County Hospital, the Woman's Medical School, Rush College, and the Presbyterian Hospital.

In the Presbyterian I was brought into intimate contact with men of exceptional character and outstanding professional ability. When I joined the junior staff about 1890, there were on the senior staff such men as Henry M. Lyman, Norman Bridge, Nicholas Senn, James Nevins Hyde, Walter S. Haines, James H. Etheridge, David W. Graham, and E. Fletcher Ingals. Later came a new group, Frank Billings, Christian Fenger, J. B. Murphy, J. Clarence Webster, Ludvig Hektoen, Arthur Dean Bevan, Bertram W. Sippy, Dean Lewis, and others. We worked harmoniously to make the hospital a place where the sick might have good care, students and members of the staff might be better educated, and productive research might be fostered. There was an *esprit de corps* that was simply superb.

From 1898, when Frank Billings came to Rush and the Presbyterian, and especially from 1900, when he became dean of the

Medical School, increasing attention was given to internal medicine; before that time the hospital had been surgically lopsided. Soon the three medical men of full professional rank in the college and senior rank as attending men in the hospital—Billings, Sippy, and Herrick—began to be referred to by outsiders as the "Big Three in Medicine at Rush and the Pres." We were as different in character and as unlike in our methods of practice and teaching as could be imagined. Students often said they liked to have the three show the same patient in clinic—as we sometimes did, borrowing from one another—for, they said, we went at diagnosis and treatment in such different ways and taught such different lessons that it was highly instructive.

We were primarily clinicians and teachers. We were not regarded as research men. In fact, it was sometimes whispered that we were so much engaged in private practice that research was impossible. Yet it seems to me that we were justified in pointing with pride to productive pioneer clinical investigations that at this period came from our trio: new facts and views concerning Focal Infection, Gastric and Duodenal Ulcer, Coronary Thrombosis.

The work which was done in all departments at Presbyterian at this time and which attracted attention was carried on in cramped quarters, with relatively few patients and limited equipment. The seniors in rank were supported by as fine a corps of assistants, residents, and interns as I have ever known. It is a pleasure to add that the tradition of those earlier days is being carried on faithfully and efficiently by new groups, who now work in enlarged, better-equipped quarters but with the same high purpose to give good service to the sick, to offer opportunity for educating physicians, and to make worth-while contributions to medical knowledge.

For several years our teaching at Rush was, from a pedagogic point of view, unscientific—a veritable hodgepodge. We were caught in the epidemic of unrest that swept the country and resulted in an upheaval in methods of medical education. There was vigorous discussion that was at times polemical and personal.

The large arena clinic, sarcastically referred to as the "amphitheatrical clinic," must go. Only the small ward clinic was proper. A recitation course was valueless, it was simply "bookish" and a training of memory. The student should be taught no pathology before he had mastered physiology; he should learn physical diagnosis by examination of normal individuals only; should see no specimens of abnormal urine or blood until he was familiar with the chemical and microscopic appearances of these fluids in normal individuals; his eager desire to get in touch with the sick individual was to be held in check until he was "firmly grounded in the fundamentals." These and other questions were thrashed over again and again. All of us aired our views and so far as possible put them to the test of practical application. We were inconsistent and changeable, no one more than our chief, Dr. Billings, who at times reversed himself completely. One of our difficulties was that we were seeking perfection, which was unattainable, not realizing that progress would, of necessity, come gradually through the method of trial and error.

I was but a mild educational revolutionist. Though I warmly advocated the small clinic, it seemed to me there was a legitimate place in the curriculum for the properly conducted recitation, the large clinic, and the didactic lecture.

In 1901, in a faculty meeting that included members from the two schools that had recently become affiliated, the University of Chicago and Rush, I spoke on "The Ward Clinic." The address was later published in *American Medicine* (October 4, 1902). A re-reading of this paper has interested and pleased me, as I note how at the age of forty I had arrived at conclusions that, in the main, seem sound today when I am well past eighty.

In this address I pleaded the cause of the ward clinic. By intimate contact it brought into play the element of personal influence of the teacher à la the Mark Hopkins–student–log tradition. Instruction could be adapted to the individual and would not have to be maintained at the level of the average man. The student learned the art of medicine by eliciting a history by him-

self, making his own physical examination and interpretation of signs and symptoms. He was led to think for himself. Each case was a challenge, a problem to be solved, a little *Arbeit*. No such practical knowledge, no such training in method, was possible from the study of a textbook or from listening to a didactic teacher.

I held that at the beginning of the study of clinical medicine a bird's-eye survey of the field by means of a recitation course would serve a useful purpose. This exercise should not be a mere memorizing of the textbook facts; it should be a conference, should include training in *how* to read and *how* to think. If it failed, the fault was due not so much to the method of a poor textbook as to the incompetence of the instructor himself.

The didactic lecture that was a mere repetition of details that were contained in the textbooks should go. But a lecture by a teacher who was familiar with the literature of recent monographs and journal articles was highly instructive. I told how a well-known professor of pathology—it was William H. Welch, though I did not then reveal the name—had with an apologetic air admitted to me that once a week he "gave a talk"—he didn't like to call it a lecture—"on immunity and kindred topics that have not yet gotten into the schoolbooks." Similarly, a professor of physiology—none other than Jacques Loeb—had said to me that, much against his inclination, he felt that he had to lecture because "no textbook can keep up with the times, you know." It seemed to me then as it does now that no apology was necessary for didactic teaching of the character described by such leaders as William H. Welch and Jacques Loeb.

I argued further that some who most vigorously opposed the arena clinic disproved their own contentions every time they showed patients in the amphitheater. They proved that it was not all red fire and theatrical display. They were able to demonstrate to the large class how to elicit a history and make a physical examination; they could discuss etiology, differential diagnosis, prognosis, and treatment and could show how conclusions were reached by logical reasoning. Furthermore, much of

the coarser symptomatology and physiognomy of disease could be exhibited. One hundred or two hundred students could from the benches see the altered appearance of the patient with acromegaly, myxedema, or exophthalmic goiter. They could note the tabetic or Parkinsonian or hemiplegic gait, or the dyspnea of asthma or of a failing heart. The characteristic pressure cough of the aortic aneurysm could be heard from the top-row seat. All these things could be done as satisfactorily, and far more economically, by the physician of mature years and wide experience who once a week met the large group, as by meeting daily the smaller group in the ward. It may be added that long after the ward clinic paper was written, no better proof of this contention of mine was ever offered than by the most vigorous protagonist of the small clinic, our energetic and efficient dean, Frank Billings. I do not remember the date, but it was at a time when, because of the affiliation between the College and the University of Chicago, classes were greatly reduced in size. One quarter, through some combination of circumstances—conflict of hours perhaps—it chanced that registration for Dr. Billings' course was shockingly small. He stood it for just one clinic. Then he stormed into the College office, and, as Jim Harper, the registrar, expressed it, "he gave me particular hell"; ordered the schedules to be changed mighty quick. "If anybody thinks I am going to talk to a small bunch of only eight men, he's got another guess coming. Maybe you fellows think that's all my thirty years of study, teaching, and clinical experience are worth, but I don't." Needless to say, the schedules were changed—and wisely.

It will not be out of place to insert here a few comments on certain dangers that lurk in the small group clinic, dangers that later experience has enabled me to recognize more clearly than I did in 1901 when I spoke to the faculty concerning the ward clinic. More than once I have heard an instructor delivering what was really a didactic lecture to a listless group of five or six pupils, when all the time he was quite unaware that it was but a miniature of the big clinic with all its faults and with no

change in method. This is but spoon-feeding with predigested facts, virtually a coddling process by which the immature mind of the student will fail to gain the strength which should come from self-exercise of his own powers. A poorly conducted small clinic may easily degenerate so that the process may be weakening rather than strengthening.

Anent the give-and-take feature of the small clinic, I recall a jolt that was once given me. I had shown to six students two cases of valvular disease of the heart and had stressed particularly the points that enabled one to distinguish between an aortic leak with a Flint murmur, and a mitral stenosis. Every student had had the opportunity of listening to the hearts. As I was rounding up the exercise with a résumé of the points, feeling quite satisfied with the work of the hour, a student several years older than I, who betrayed his German origin by his accent and the scar on his left cheek typical of the duel of the university *Verbindung*, said: "Dr. Herrick, I don't mean to be impolite or to question your facts but *what difference does it make?*" For a moment I didn't grasp his meaning. Then I saw what his question implied: no matter what the murmurs were or what name you gave to the lesions, if there were dyspnea and other evidences of failing heart, was not the routine treatment rest and digitalis? As for a moment I hesitated, the other five students amusedly watched to see how their instructor would answer the embarrassing question. When I had collected my wits, I called attention to the difference in etiology in the two patients, the lesion of the one being due to syphilis, of the other to rheumatism. There was a difference in outlook, a greater probability of involvement of coronary arteries and complications in the aortic arch in the one, more likelihood of embolic accidents or recurrence of rheumatic fever in the other. The two patients, therefore, should be treated along different lines, etc. I felt that I made a pretty good comeback, but I had to admit that there was a point to the blunt question of the old Heidelberg student. Occasionally in later years, as I have labored some question down to minutiae that were perhaps inconsequential or have

heard others doing the same thing, I have thought: "Well, what difference does it make?"

Billings, Sippy, and I were individualists enough to avoid overstandardization. Each one of us tried to do his best as an instructor and did it in his own way.

I frankly devoted a portion of the time to a didactic presentation of the topic for the day, aiming to stress the knowledge that was more recent rather than that found in the textbooks. The second hour was more strictly clinical. Usually a student who had had ample time to examine the patient was asked for the history and the diagnosis. By questions and answers, examination before the class, discussion of laboratory findings, etc., a diagnosis was reached and conclusions as to treatment decided upon. Taking the hint from Osler, I often assigned to some student—and the students gladly volunteered—the task of looking up some topic of collateral interest. Some excellent reports were made on such topics as Laennec, Litten's sign, bronzed diabetes, Pick's disease. One report was made by a Chinese. His modesty, his poise, his orderly presentation of the topic, his clarity, and his delicious sense of humor took the class by storm and drew a round of applause, in which I heartily joined.

Gradually there evolved a routine that functioned fairly well for several years. In the department of internal medicine there was a short, bird's-eye recitation course. Ward clinics were held at the County Hospital by Rush instructors. Two all-time paid residents had charge of the ward classes in Presbyterian Hospital. The Central Free Dispensary was more efficiently utilized for teaching. Six elective, that is, noncompulsory, arena clinics a week, each 9:00 to 11:00 A.M., were offered by Drs. Billings, Sippy, and Herrick. Ultimately, we leaned more and more heavily on our associate and assistant professors. Later, as opportunities for ward teaching increased, the hours for the large clinic were shortened.

When, at sixty-five, I became professor emeritus, there was a feeling of relief from the active work that was beginning to be

onerous. But there was also a keen sense of loss as I realized that I could not longer be brought into intimate contact as a teacher with the bright young students on the benches who were training to enter the glorious profession of medicine.

It may be added that this interest in pedagogy was fostered also by contacts with educators whose thoughts were not primarily concerned with medicine. For many years I was a member of the Board of Managers of Lewis Institute of Chicago, which later merged with Armour Institute to become the Illinois Institute of Technology. On this board there were at various times prominent educators like George N. Carman, the Institute's director; William Rainey Harper; Albert G. Lane, the county superintendent of schools; Edmund J. James, at the time president of Northwestern University; and, after Dr. Harper's death, Harry Pratt Judson and Charles H. Judd, both of the University of Chicago. The most forceful and brainy member in the earlier days and a faithful attendant at meetings was Dr. Harper. His views on educational topics were clearly and incisively expressed and were listened to with great attention. It pleased me to note that he and I held many views in common. Somewhere tucked away in my archives is a note from him, thanking me for having rescued him from an embarrassing situation by some remarks I had made at a meeting of the managers. I had, he wrote, expressed his views exactly, views that had to be voiced, though they were opposed to those of Director Carman and some other members. If, Dr. Harper continued, he himself had uttered them, his position might have been misinterpreted as inspired by jealousy because he was the head of what might be regarded as a rival institution.

This reference calls to mind another incident that occurred in a faculty meeting that was held soon after the affiliation of Rush with the University of Chicago in 1898. The revision of plans for teaching was under discussion. The question of election of studies by the student was raised. Several of the older men spoke. I recall how Dr. Billings, who had just joined Rush,

argued strongly against allowing the immature student to choose his studies; the older, experienced teachers should decide what studies were most suitable, etc. Dr. Harper expressed no opinion, but said, "Can't we hear from some of the younger men?" With shaking knees and a voice that at first faltered, I rose and advocated a plan by which for the first two years the studies would be compulsory and the course rather definitely laid out. At the end of the sophomore year, however, there should be much more freedom; in the last two years election of subjects and teachers should be not only permissible but encouraged. I sat down astonished at my own boldness in opposing the views of the older group, fearful that I had lost caste with them by not following their lead, sure that I had made but a weak presentation of my theme. There was a little further desultory discussion. Then Dr. Harper spoke substantially as follows: "Gentlemen, I have two things to say: First, many of you apparently think that we should take action tonight on this important question. I don't agree. A faculty meeting should not be considered as primarily legislative in character; rather, it is educational. By consultation and free exchange of views we learn. Only when we are satisfied that action is wise should motions be passed that commit us to some important alteration in policy. We are not ready for action tonight.

"Secondly, you have asked what I as your president think about the topic that has been so fully discussed this evening. I don't need to make a speech. Dr. Herrick has expressed my views exactly." Then he deftly gathered together the ideas I had advanced, setting them forth in a clearer way than I had done and said, "A motion to adjourn is in order."

One of Dr. Harper's special gifts was his ability to stimulate and encourage others, particularly the younger men, to independence of thought and action. He often went out of his way to give credit graciously to others when he might easily have taken it himself.

CHAPTER XI

Medical Writing and Medical Societies

Nicht nur Docendo sondern auch Scribendo discitur.

THEODOR BILLROTH

EVEN before I had finished my internship in the County Hospital I had written one or two medical papers. Why I rushed into print so early is a mystery to me. Perhaps it was due to an inherent *cacoethes scribendi*, or it was a manifestation of a variety of spring fever that found expression not as in Chaucer's "longen for to goon on pilgrimages" but in an uncontrolled impulse to talk, write, and print. My early contributions were mainly brief reports of cases which seemed worthy of record because of some unusual clinical symptom or diagnostic feature. These papers attracted but little attention here or elsewhere. I recall, however, the thrill of excitement that came to me one day as I was looking through the high-toned Virchow and Hirsch's *Jahresbericht* and saw my name—"Herrich [*sic*], James B."—and the title of a recent article of mine. The thrill changed to a jolt as I read this terse, clear, yet comprehensive epitome: "Nichts neues."

One paper, however, "Report of Cases with Autopsies" (Chicago M. Rec., 1891), attracted a good deal of local attention. It was caustically criticized by some of the older doctors in Chicago, though it was praised by my younger colleagues, who had really egged me on to write it. We "Young Turks" fresh

from the County, feeling our oats, derided among ourselves the ignorance of the old-timers regarding the newer knowledge of infectious diseases, appendicitis, and the diagnostic significance of certain signs and symptoms. While working with Dr. Earle, I had been astonished at the error of one of my own professors in turning me down on my diagnosis of traumatic rupture of the bladder. I was especially resentful toward a rather self-important surgeon who, in another case, had ridiculed my diagnosis of perforative appendicitis: "It is simply a case of catching cold at the menstrual period. Young man, when you have had a little more experience you will not be so cocksure about your new-fangled notions." These were patients of Dr. Earle, who, as was his custom, had secured permission for the autopsies and was elated when it was shown that my professor and the self-important surgeon were wrong. "By Jiminy, my boy," said Dr. Earle, "you were right!"

Now it happened that my paper reporting these two cases, together with three others, had unusual publicity. By chance it was read before the Chicago Medical Society as a sort of curtain-raiser just before a thriller address that was dramatically delivered by Nicholas Senn entitled "Away with Koch's Lymph." Senn's timely paper drew a crowd. It was a warning to call a halt on the indiscriminate and dangerous use of tuberculin until more definite proof of its harmlessness and value had been advanced.

In my paper I had "pulled no punches"; I had criticized prominent physicians for failing to keep up with the times, for ignoring significant facts in the clinical history, for slighting physical signs and symptoms. More attention to these details would have enabled them to make a correct diagnosis. As I read the paper today, I can understand why one of my older friends advised me not to publish it: "Dr. Herrick, it is not in good taste; it is too personal. At least, tone it down." I toned it down a little but had it published. The small storm it raised soon subsided, and all was forgotten and, I trust, forgiven.

About 1896 my case reports began to give evidence of more

clinical and laboratory investigation, and there was an element of originality in them.

In 1912, my paper on "Clinical Features of Sudden Obstruction of the Coronary Arteries" appeared, based on a case of coronary thrombosis in which I had made an ante mortem diagnosis. Recognizing the radical nature of the views I held, which led me to conclude that this condition was not, as was then the belief, merely a pathologic curiosity but in reality a clinical entity with symptoms that often made it possible to diagnose it during life, I postponed publication for some time until, by search of the literature and further observation, I had reached conclusions that seemed to me justifiable and sound. The paper when read in 1912 before the Association of American Physicians aroused no interest. It fell like a dud.

Firmly convinced that I was right, I doggedly kept at the subject, doing what I called "missionary work." In papers that I read here and there I hammered away at the topic, but with little apparent effect on my listeners. When, however, in 1918 before the Association of American Physicians I read my paper on "Coronary Thrombosis," in which were included reports of two more cases with autopsies and which also told of the pioneer experimental researches of Fred M. Smith on the coronary artery in dogs (Why is it that work done in the laboratory on a dog attracts more attention than that done in the ward on a human being?); when I showed lantern slides and electrocardiograms, physicians in America and later in Europe woke up, and coronary thrombosis came into its own, to become later a household word translated by the layman into "heart attack." How my interest in this topic was aroused and how it was kept up is told in "An Intimate Account of My Early Experiences with Coronary Thrombosis," published in the *American Heart Journal* for January, 1944.

Then came writings that seem to me to show more maturity of thought and improvement in style, like the Frank Billings Lecture delivered in 1934 in the Section on Medicine of the American Medical Association. The topic was "The Clinician

of the Future." I had worked hard in preparing this paper, for I felt that I had a message: Because of the increasing mass of knowledge the old type of family doctor was inevitably disappearing; specialism was unavoidable. The practitioner of the future must, as did his predecessor, get his training at the bedside. Yet there should be no clash with the laboratory research worker, there should be friendly co-operation between these two groups. I closed: "Yes, there will surely develop in the future—he is already well on his way—a competent practitioner, who, with integrity of character, with ideals of medicine as a profession and not a trade, with mind well stored with knowledge and with skill to apply it in the treatment of disease, with consciousness of his limitations, with readiness and ability to advise when and where expert help may be obtained, with good judgment and keen powers of observation sharpened by experience at the bedside and at the autopsy table, is worthy to be the family doctor or adviser, with all the traditional privileges and rewards that came from the personal relation of the old time doctor with the family—esteem and high standing in the community, the confidence and affection of his patients." The paper was well received, and I had many congratulatory letters, although a few letters came, protesting that I had betrayed the family doctor.

The Johns Hopkins Hospital address (1939), and the one I delivered in 1938 as president of the Congress of Physicians and Surgeons, also seem to me of a more elevated character than earlier ones. I may add that I was surprised at being asked to deliver on May 4, 1939, the "main address" at the fiftieth anniversary of the opening of the Johns Hopkins Hospital. No honor ever gave me greater pleasure than did this request. When honorary degrees had been conferred on me by universities or when the Kober Medal had been awarded by the Association of American Physicians or the Distinguished Service Medal by the American Medical Association in 1939, there were always flattering references to my work on coronary thrombosis and sickle-cell anemia. I was always conscious of being the recipient

of an honor. But here the world-famous Johns Hopkins school was asking me to honor them. There was a peculiar pleasure in realizing that they had selected as their speaker not some leader in medicine from the East but a physician from the West, who was, moreover, a graduate of Rush College which, in the opinion of some of the high-brow critics of the time, was unworthy of being rated as a first-class medical school.

My writings of the last ten years reveal an increasing interest in the history of medicine, a natural trend for a physician who is growing old. There were biographical sketches of several prominent physicians. The one on Allan Burns (1935), the brilliant young Scotsman of Glasgow, was the result of much study and original historical research. A friend commenting on it called it the best thing along this line that I had ever written. In 1942, *A Short History of Cardiology*, a small volume of two hundred and fifty-eight pages, was brought out. Sir Thomas Lewis, in a favorable review of the book in an English journal, as well as in a personal letter, made two criticisms: He didn't like the title. For "Cardiology" he would substitute "Heart Disease." And, he said, modesty should not have prevented me from discussing more freely and at length the coronary artery, not omitting my own contributions to this subject. With these changes a second edition would properly be called "A History of Heart Disease." Praise from such a source naturally pleased me.

The urge to join with one's colleagues in meetings for a mutual exchange of ideas, whether this urge be inborn or acquired, is akin to the desire to teach in the medical school. In reality, participation in the work of a medical society is a modified form of teaching. But in the society the audience is made up not of young, inexperienced, passively receptive undergraduates, but of physicians who may be one's elders in years, one's equals or superiors in knowledge. The doctor who reads a paper before such a group must be prepared to debate with worthy opponents who may challenge his statement of facts or question the

correctness of his conclusions. He has to think on his feet. He must give and take with good grace, for if he loses his temper he is likely to lose the contest. He must be tolerant. He has to get rid of the notion that one who disagrees is probably actuated by selfish or dishonest motives. He may be surprised when in the end it turns out that the critic whom he viewed with suspicion was not only sincere but was correct as to his facts and conclusions.

As I re-read today some of the papers I read before societies and recall the circumstances under which they were presented, it is clear that most of my failures or near-failures were generally due to lack of accurate knowledge, hurried or incomplete preparation, or an attempt to cover too much ground. Or the paper was not adapted to the audience—it was either over their heads, or it stressed the known or the obvious to hearers who were better informed than I had supposed.

Success or failure was not necessarily dependent on the time taken in preparation. In 1898, I wrote a short paper on "The Treatment of Ulcer of the Stomach by Rest and Rectal Feeding." It was written in one evening, was well received when read before the Chicago Medical Society and favorably commented upon when printed. It was timely, terse, and full of meat; there was an element of originality about it. Forty years later I worked for some four months on a paper, a medical lecture to the public under the auspices of the Institute of Medicine of Chicago. The disappointing result was due to the fact that the subject made but little appeal to laymen, there was a small audience in a large hall, and a long delay in beginning. I showed too many lantern slides, with extempore comments; I overran my time by twenty minutes.

There are times when a speaker who is filled to the brim with his subject—"supersaturated," as the physical chemist puts it—does well to ignore the stereotyped, orderly memorandum that he has made out and to deliver his message with enthusiasm and abandon, perhaps changing his plan while on his feet and using language that is inspired by the impulse of the moment. When

he finishes, he may regret that he has omitted something that he had intended to say or has dwelt too long on some seemingly minor detail. But his address has gone over. A typewritten paper would have dragged. Too slavish an adherence to written notes would have been less effective.

Two occasions of this kind come to mind. I was invited to take part in the program of the American College of Physicians at the meeting in 1937 in St. Louis. Against my inclination—at seventy-six I was content to sit quietly on the sidelines—I consented. The meeting was held in an amphitheater that would seat nearly two hundred. There was standing room only. There was an atmosphere of friendliness. Some of the old-time fire was rekindled as I talked without notes for thirty minutes on the familiar topic, "Thrombosis of the Coronary Artery." The address was enthusiastically received.

On another occasion I was scheduled to hold a clinic for visiting doctors of the American College of Physicians, in Peter Bent Brigham Hospital, Boston. Just before the time for the meeting, the patient who had been picked out from Dr. Samuel Levine's ward took a sudden turn for the worse. I had to go before a packed amphitheater and talk of subacute bacterial endocarditis without the sick man; it was a so-called "dry clinic," with no opportunity for the audience to hear the history elicited or to see the patient. It was *Hamlet* with Hamlet left out. The fact that there was merely the case history as a text must have spurred me to an unusual effort. At any rate, I filled the hour with a lively discussion of bacterial endocarditis. I asked questions of the practitioners and was questioned by them in turn. The affair was largely of an impromptu character and at close range. It was a gala occasion. Apparently "a pleasant time was had by all."

This meeting recalled a heartbreaking failure when, some years before in the same room, I gave a clinic to Harvard medical students. I misjudged my audience, bungled my topic, and felt deeply humiliated.

About 1902 I took part in the program of a medical society

in Dubuque, Iowa, speaking to a group of fifty or sixty on the clinical importance of examination of the blood. I soon realized that I had lost my hold on the audience. They had grown listless, two or three were asleep. When I closed, there was a polite clapping of hands but also what sounded like a sigh of relief. A partial explanation of the lack of interest was disclosed when I looked at the thermometer and saw that the temperature was 101°. The major reason, however, was that I had talked about a subject concerning which they had no curiosity. Most of them had never heard of myelocytes and normoblasts and did not care to learn. Consolation came to me from one of the younger men, who said he believed he was the only doctor in Dubuque who took a foreign journal. In this he had read something about the subject and was interested. What books should he buy? Where could he get Ehrlich's stain?

In 1931 I gave the Calhoun Lecture in Atlanta before the State Medical Society of Georgia. I wrote Dr. James Paullin, president of the society, asking suggestions as to a proper subject. He gave me excellent advice, which ran something like this. "For God's sake don't give us any high-brow stuff. Tell us what will be understood by doctors of ordinary intelligence like Georgia crackers from the sticks who will be there in large numbers. Frankly, you'll not be firing as much below the level of the Atlanta bunch as you may think." Following his advice I read a paper on "Common Errors in the Treatment of Heart Disease." It was simple, practical, yet scientific, and was well received. Had I discussed special features of the electrocardiogram, the pharmacology of digitalis, or the latest theories of hypertension, it would have fallen flat.

The professor in the medical school or the attending physician who takes an active part in the affairs of a medical society, reading papers that later appear in print, may find to his surprise that he is subjected to criticism by doctors who hint, or openly assert, that self-advertising is the activating motive for the frequent appearances on society programs and in the pages of medical journals. For a time in Chicago, in the late 1890's

and early 1900, we imagined we were relatively free from quarrels and bickering, at least as compared to what we heard of some cities in the East. Then trouble began in Chicago. There were two groups. The successful, high-priced, Gold Coast doctors were called "high-brows"; the hard-working, poorly paid general practitioners of the poorer districts, "low-brows." Party feeling ran high, criticism became vindictive and sometimes personal. It was largely a battle of the ins against the outs. The low-brows were clever politicians who were well organized. By shrewd work they gained control of the Chicago Medical Society. The high-brows talked of stuffed or stolen ballot boxes and other dishonest doings. Many stones were thrown, and several windows broken in the glass houses in which the factions lived.

Two incidents that had their origin in these conditions affected me personally. On my initiative, the Society of Internal Medicine of Chicago had been started in 1915. I was its first president. No sooner was the society formed than it was opposed by the Chicago Medical Society. There was no charge of illegal or unethical conduct, but we were informed that we must become an integral part of the Chicago Medical Society, subject to its control, or it would oppose us in every way possible. The new organization decided to operate independently. For a long time we were ignored or harassed by the larger organization, which refused to print in their *Bulletin* announcements of our meetings and in other ways subjected us to petty annoyances.

In 1922, much impressed by the formation in New York of an Association for the Prevention and Relief of Heart Disease, I took a leading part in the organization in Chicago of a similar association. There was an enthusiastic response on the part of other doctors and some laymen. We sent out a little folder announcing that the purpose of the association was to educate the patient, the public, and the physicians about heart disease and how to avoid it when possible; how to treat it when it was present; and how to be of assistance to the indigent sufferer from

this affliction. Eighteen physicians and five laymen made up our board of governors. We asked lay people and doctors to support us by becoming members. What was my surprise when in June, 1923, I received a letter from the chairman of the Grievance Committee of the Chicago Medical Society requesting me or someone authorized to speak for our association to appear before the committee and "show cause why charges should not be preferred against individual members for violation of the Section of the Principles of Medical Ethics of the American Medical Association that defines improper solicitation of patients by direct or indirect methods of advertising." As I had been the prime mover in starting the Heart Association and was its president, it fell to me to head the defense before the committee, the three members of which were low-brows. I was loyally supported by colleagues like Robert B. Preble, Joseph L. Miller, Sidney Strauss, and others, who had joined in sending out the leaflet announcing the organization of the Heart Association and its purposes and in making an appeal for lay support. This circular, our critics averred, showed that we had organized for personal, financial gain; the circular was but an advertising dodge. We claimed that our motives were altruistic, we desired to help furnish service to the needy poor who were sufferers from heart disease; also to educate the public, the patient, and the physician to a better understanding of this increasingly frequent and serious malady, the possible ways of preventing, and the best ways of handling it.

Our critics, honestly believing they were right, charged us with intent to take the bread and butter away from the underdog, the struggling family doctor, who, they said, could just as efficiently give digitalis to a heart patient or prescribe rest in bed as the doctor who claimed to be a specialist, who taught in a college, or who had an office on Michigan Boulevard with a beautiful view of the lake. I tried as best I could, and as calmly, to meet their arguments. I shall never forget how one of our opponents turned and angrily said, "Do you mean to say, Dr. Herrick, that the general practitioner doesn't know how and

when to give digitalis, and that he needs education along that line?" Before I could reply, Dr. Preble jumped into the conversation; "You're jolly right he needs that education. There is more damned nonsense and more harmful ignorance as to the use of digitalis than about any other feature of heart disease." "Well, you were my teacher," countered the protester. "Jones, I'm afraid I made a bad job of it," was Preble's comeback. Finally we were acquitted.

So the battle between high-brow and low-brow went on. Gradually rancor died out, wounds were scarred over, and little remains except a dim memory of the stirring times of bitter animosities. Today harmony prevails. The Chicago Medical Society publishes the programs of the Society of Internal Medicine. Joint meetings of the Chicago Heart Association and the Chicago Medical Society are not unusual occurrences.

I am writing these lines but a few days after a meeting of the Chicago Heart Association attended by more than two hundred doctors and laymen. The purpose of the meeting was to arouse interest in a drive for $200,000. At the head table: the chairman of the meeting, Morris Fishbein, editor of the *Journal of the American Medical Association;* Mayor Kennelly of Chicago; G. K. Fenn, chairman of our association; Wingate Johnson, a trustee of the American Medical Association; Arlie Barnes, president of the American Heart Association; Dr. Howard Rusk, a writer on public health matters for the *New York Times*. As, seated beside Dr. Rusk, I looked at the enthusiastic audience and listened to the speakers, I felt rather proud of this evidence of vindication of the association, which had started under such unfavorable auspices twenty-four years before. And now, in 1949, the association is trying to raise $1,000,000.

There has taken place a gradual, yet marked, change regarding what constitutes improper publicity on the part of the doctor. Today his interview with a reporter and his picture appear in the newspaper or the lay magazine. He is heard over the radio. The American Medical Association and other organizations are no longer so allergic to the spread of information re-

garding heart disease, cancer, tuberculosis, or infantile paralysis as they were two decades ago.

It is not always easy to make out the dividing line between ethical and commercial advertising. Some medical clinics and some individual doctors have sinned at times, unwittingly or wittingly. Perhaps all of us ought to cry "*Peccavimus!*" When analyzing the features involved in this problem and in order to reach conclusions that are sound, one has to give up some idealism and, as a realist, to confess that not all physicians are born with equal ability. Some are by nature more capable of study, teaching, writing, or carrying on productive work at the bedside or in the laboratory. Some complainers are drones who do not realize that a major qualification of success is hard work and that the fault is not in their stars but in themselves that they are underlings. Successful doctors are not by any means actuated solely by egotism or by a desire to gain prestige or financial returns at the expense of patient or colleague. Such accusations are unwarranted. These men have a distinctly altruistic motive, *non servari sed servare* might well be their motto. They strive by study and experience to decide what of the old knowledge is worth remembering; by investigation to discover new facts and principles that may be applied to the relief of suffering and to the prevention and treatment of disease.

It may be added, as a corollary, that the physician who feels that his function is to impart knowledge to, and correct the errors of, his less-well-informed fellow-practitioners is sometimes surprised when he realizes that he has received more than he gave, that he has himself learned much by teaching. Billroth enlarged on the truth which is contained in the old maxim *discere docendo* when he wrote: "Nicht nur Docendo sondern auch Scribendo discitur." We learn not alone by teaching but also by writing.

Though my connection with certain national medical societies—such societies as the American Heart Association and the American Society of Medical History—meant much to me,

I need not dwell on it. A special word should be added, however, concerning the Association of American Physicians, membership in which has meant more to me than that in any other society. When I joined in 1898, I was brought into intimate contact with the élite of the profession, who were practitioners, teachers, writers, and investigators in internal medicine or closely allied branches, like pathology.

The association had been started in 1886 as a protest against the way in which the Section on Medicine of the American Medical Association was run—run, it was contended, by a wire-pulling, narrow-minded clique of old fogies, with Dr. N. S. Davis at their head, who were more devoted to medical politics than to scientific medicine. These old-timers practically selected the officers and arranged the programs, which were largely little more than "experience meetings." Scant opportunity was offered for the discussion of matters that were modern. Efforts to change this policy had been fruitless. The result was a revolt. The first meeting of the new-dealers was held in Washington, June 17 and 18, 1886.

The meeting was remarkable for two things, the unique address of the president, Francis Delafield of New York, and the character of some of the papers presented.

Instead of delivering a long talk of the stereotyped pattern that would have been customary on such a momentous occasion, Dr. Delafield read a brief statement of about three hundred words, from which I quote: "We all of us know why we are assembled here today. It is because we want an association in which there will be no medical politics and no medical ethics; an association in which no one will care who are the officers, and who are not; in which we will not ask from what part of the country a man comes, but whether he has done good work, and will do more; whether he has something to say worth hearing, and can say it. . . . We want a society in which we can *learn* something. And this, I take it, is the real object of the enterprise which we inaugurate today—to form an Association of Physicians and Pathologists to which we may come year

after year with the well-founded hope that at each meeting we will find something to learn."

The association was to consist of one hundred carefully selected members. The lively interest in its formation was shown by the presence of fifty-eight out of seventy-five charter members at its first meeting.

There were several papers of a character that would never have secured a place on the program of the Section on Medicine of the American Medical Association. The outstanding contribution was that of Reginald Fitz, of Boston, on "Perforating Inflammation of the Vermiform Appendix with Special Reference to Diagnosis and Treatment," which was discussed by William Pepper, of Philadelphia, and E. C. Janeway and Alfred Loomis, of New York. As is well known, these observations of Fitz were epoch-making. He was the first to show conclusively that in a large proportion of cases called "peritonitis" or "inflammation of the bowels" the primary trouble was in the appendix. It was he who put appendicitis on the map.

Another paper that attracted attention was by W. T. Councilman, of Baltimore, on "Certain Elements Found in the Blood in Cases of Malarial Fever." The plates of Councilman showed what he called "pigmented amoeboid bodies," later spoken of as the "plasmodium" of malaria. This demonstration confirmed the findings of Laveran. All this was new; Osler, then at Philadelphia, was not convinced: "That these bodies actually represent organisms, I am skeptical. They seem to me to represent, rather, vacuoles or hyaline spaces." But Councilman and Sternberg held to the organism idea and, with a delicate sarcasm, reminded Osler that it was something new that "vacuoles should stain with aniline colors."

When in 1898 I became a member of the association, it was almost with awe that I sat in a back seat and listened to the great men of medicine, who were well toward the front, taking an active part in the proceedings—the well-known teachers, authors, and investigators of the United States and Canada. There was Abraham Jacobi, who, driven from Germany in the uprising of

1848, became a celebrated pediatrician in New York and later scornfully declined an invitation to head the chair of pediatrics in the University of Berlin. Near him usually sat Samuel J. Meltzer, also of New York, well known for his researches in physiology. There were leading practitioners of advanced medicine—Fred Shattuck, of Boston; Alexander McPhedran, of Toronto, E. G. Janeway, of New York; William Pepper, of Philadelphia. From Philadelphia came also the attractive J. M. Da Costa, a charming speaker, whose scholarly and practical textbook on *Medical Diagnosis* had gone through many editions. It was he who during the Civil War had observed the irritable heart of soldiers. His article on this subject, unearthed during World War I, attracted wide attention. S. Weir Mitchell was there, known for his researches concerning snake venom and his contributions to psychiatry, as well as for his literary writings like *Hugh Wynne*. William H. Welch, of Baltimore, and Victor Vaughan, of Ann Arbor, were leaders in laboratory research in pathology and bacteriology. Theobald Smith's reputation was world wide because his discovery of the tick as the cause of Texas cattle fever had shown that this disease could be transmitted by means of insects. And then there was Trudeau, friend of Robert Louis Stevenson. In the Adirondacks he showed the possibility of carrying on the fresh-air treatment of tuberculosis in the cold of the north.

At the first meeting that I attended, the one in 1898, I was surprised to notice William Pepper sitting in front of me, well to the back. Instead of listening intently to the paper, as I supposed all these famous men did, he was busily engaged in making out what appeared to be his list of calls for the afternoon in Philadelphia, which he could reach by cutting the afternoon session. He was a live wire, a fiend for hard work, the leading physician in Philadelphia. He died of angina pectoris shortly after the meeting.

I was a faithful attendant at our annual sessions, wrote papers, took part in discussion, and gradually found myself sitting closer to the front row. Then I became a member of the coun-

cil and, in 1923, president. The next year, according to precedent, I resigned, going on the emeritus list and thus making a place for some younger man.

In 1930 I received from the association the Kober Medal, an honor most highly appreciated. This medal was conferred annually on one who in the opinion of the council had made some noteworthy contribution to medicine. In my case it was chiefly my work on coronary thrombosis.

I was the sixth recipient of this medal. Before me, beginning in 1925, had been H. Noguchi, Theobald Smith, William H. Welch, Victor C. Vaughan, George R. Minot. I was the last to whom the medal was presented in person by the venerable and kindly George M. Kober, the old Army doctor whose generosity had made this award possible. Dr. Kober died soon after. The Kober Medal still continues to be presented each year at the meetings of the association.

An incident that occurred in connection with the association seems to me both amusing and illuminating. For nearly seventy years I have been a lover of Chaucer. I have read all he ever wrote. No year passes that I do not re-read some of his works. But never have I made claim to scholarship in that field, though some of my overenthusiastic friends mistakenly claimed it for me. Twenty-eight years ago I read before the Literary Club of Chicago a paper entitled "Why I Read Chaucer at Sixty." It fell flat—a dud. Then ten years later an S.O.S. call came to me: Could I on short notice be the speaker at the annual dinner of the Association of American Physicians? I changed the title of the paper to "Why I Read Chaucer at Seventy," and it went over—big. Mrs. Sewell, the wife of Dr. Sewell of Denver, told me later how, just before the dinner, she had heard in the lobby of the hotel a conversation between two doctors, members of the "Young Turks," a society junior to our exclusive high-brow body. "What's on at the association tonight?" said one. "Oh, their annual dinner with a paper by Dr. Herrick of Chicago." "What's his subject?" "Subject? 'Why I Read Chaucer at Seventy.' " "Well," said the questioner, "I know who Dr. Her-

rick is, but who in hell is Chaucer?" "Now, Dr. Herrick," said Mrs. Sewell—and she was a very wise woman—"perhaps you may feel flattered; but think it over and see whether the young man's reply is a compliment to your profession." I have thought of it many times since then. These were high-grade young doctors, future investigators, teachers, practitioners, men familiar with medical science of the day—hormones, vitamins, the coronary artery, cancer cells—but saying, "Who in hell is Chaucer?" The blunt words of the Young Turk made me think seriously of the place of culture in medical education.

It will not be out of place to speak here of Dr. N. S. Davis. His name had been familiar to me from the time I began the study of medicine, since he was the president of the Chicago Medical College, now Northwestern University Medical School, a rival of Rush College. One heard of him, also, as an active member of the Chicago Medical and Illinois State Medical societies. Yet he was much more than a local celebrity. He was a national institution—the venerated founder of the American Medical Association, ever its ardent defender.

To see him, as I did a few times, tall, slender, always wearing a high hat and a swallowtail coat, one might think he was just a freak from an age already past. But his intimates contended that when one saw him in action, saw the wiry frame quiver as with the excitement of battle, noted how the firm jaw was pushed prominently forward and how from beneath the rough overhanging brows the eyes flashed fire; when one heard his piercing voice that seemed to challenge combat, one realized that in that compact frame there were the elements of a great leader: energy, stubborn courage, initiative.

Dr. Davis was an ardent Methodist. Yet he was shrewd enough and practical enough to unite in founding and in running the Catholic institution which later became Mercy Hospital. "Mike," I said to a patient one day, "how can you go to Dr. Davis at Mercy Hospital to get over the effects of your booze when you know he's a Methodist and is dead set

against alcohol?" "Doc," he replied, never batting an eye, "I'll go to old man Davis' hospital. When a man's sick, what the hell difference does it make?" I had no answer then; I have none now. At the memorial service for Dr. Davis, Catholic Archbishop Spalding of Peoria and Methodist Bishop Merrill spoke from the same platform in Hooley's Theater in praise of this unique man.

We young physicians heard, chiefly through gossip, of his eccentricities, his brusque manner in handling patients, his outbursts of anger, his vindictiveness, and his cranky notions as to the use of alcohol. About 1898 in a meeting of the Chicago Medical Society, I listened to Dr. Davis as he discussed the treatment of pneumonia. He was in his late seventies, spoke clearly and calmly, yet forcefully; had a twinkle in his eye when he said, "You surely do not wish *me* to endorse the use of alcohol in the treatment of pneumonia." When at this meeting I met him, being introduced by Dr. Billings, I felt in the warm grasp of the hand, the few simple words of cordial greeting extended to me, that, in spite of his irascibility and arbitrary methods, there were kindliness, comradeship, and sincerity of purpose to do good.

From across the street, one hot summer day—it was shortly before his death in 1902—I saw N. S. Davis, always a striking figure, slowly walking toward the Northwestern Station, then at Kinzie and Wells streets. As I noted the dogged perseverance with which this octogenarian with difficulty dragged a leg that was partially paralyzed from a recent stroke, when I thought of what he had accomplished in his sixty years in medicine, I realized that I was looking at one of the giants in the American medical world, a great physician, a genuine gentleman of the old school. I have always been glad that it was my privilege to have seen and met him.

No member of the Association of American Physicians had a more marked influence on me in my formative years than did William Osler. Before I had met him in person, my atten-

tion had been called to him by his *Textbook on the Principles and Practice of Medicine*, which appeared in 1892. After eagerly reading its almost two thousand pages, I wrote a long, laudatory review, which closed with the statement that it was not extravagant praise to call the work the best textbook in English on the practice of medicine.

I can see today that I was in the mood to be captivated by such a book. There had been gradually developing in me a dissatisfaction with much of the medical writing of the time. The growth of this feeling can be traced from the days of my childhood. At first, I believed what my teachers told me and what I read in schoolbooks. As I grew older I sensed the fact—unconsciously, I am sure—that some teachers knew more than others, that they distinguished between a statement of opinion and one of fact. So, still believing what I read, I began to be more critical of what I was told, accepting or doubting as the case might be, largely according to the personality of the teacher. Still later I realized that I could not always rely on what I read. An author might mislead because he was dishonest or poorly informed; or by illogical reasoning he might stray from or distort the truth. Thus I became tainted with medical skepticism and lost much of my veneration for the printed page. Yet some books—I did not stop to ask why—made a strong appeal to me. I read them eagerly and believed them. I recall how as a student I was attracted by two of this character, Billroth's *Surgical Pathology* and Ranney's *Applied Anatomy of the Nervous System*. Of course, I never questioned the facts in an encyclopedic work like Gray's *Anatomy*, except, perhaps, when some unrecorded anomaly was encountered in the dissecting room or at operation. Books about drug therapy I frankly distrusted. Loomis' *Practice* did not satisfy.

It must have been about 1898 when I first met William Osler. For no good reason I had pictured him to myself as of the dignified, unapproachable type, rather paunchy and burly, perhaps with mutton-chop whiskers. As John Musser, Sr., the father of the late John Musser of New Orleans, and I were talk-

ing in the lobby of the hotel in Washington, the real Osler breezed in—short, dapper, slender. Unceremoniously he gave Dr. Musser a poke in the ribs and said, "Here, Musser, why don't you introduce me to Herrick?" Dr. Musser very properly introduced Herrick to Osler, who within two minutes had me in one of the horse-drawn phaetons that were then—would they were now!—so plentiful in Washington and who directed the driver to go slowly to the Surgeon General's Library, where, he said, he wished to get some particular book. Before we reached our destination he had, like an expert reporter, pumped me dry regarding medical matters in Chicago; had learned about my own affairs and my aims; had given me two or three hints regarding nonmedical books, for he discovered that I occasionally "lapsed into culture," as George Vincent once said of another physician. He introduced me to the librarian and told me how by a deposit of ten dollars I could have books sent to me in Chicago. A more inspiring, delightful hour I had never spent. I had fallen a victim—a willing one—to the charm of the Osler personality. Whenever I consulted his textbook I found this personality was there—the friendliness, the joviality, the helpful hints, the stimulus to read original articles and monographs, to read the best of the old as well as the new, to forget exploded theories, to write clearly, yet succinctly.

In the address delivered in 1939 at the celebration of the first fifty years of the Johns Hopkins Hospital I ventured to suggest that the greatest gift that institution had made to medicine had been William Osler, whose writings and life had left an ineffaceable impress for good on the entire English-speaking world of medicine. I was not unmindful of the services of the others of the so-called "Big Four"—Kelly, Halsted, and especially Welch, whose constructive ability was responsible for many of the important developments at Hopkins, who was the balance wheel of the medical group, the philosopher of great knowledge and broad views whose wise counsel was often sought on medical matters in places far remote from Baltimore. Without meaning to rob any one of these three of the credit

which was his due, I stated my belief that the influence of William Osler was as great as, perhaps greater than, that of any other medical man in the English-speaking world in the last one hundred years. I still hold this view. Sir Humphrey Rolleston went even further, saying extravagantly, as it seems to me, that Osler at the time of his death (1919) was the greatest personality in the medical world.

It is difficult to assess at its real value the worth of such an influence as he exerted; the secret escapes us. He made many valuable contributions to medical knowledge, yet is credited with no epoch-making discovery. He was an excellent diagnostician, clinician, and teacher, yet some of his pupils and colleagues were regarded as his equals in these respects, perhaps even his superiors. Though an effective speaker, he had no surpassing gift as an orator.

But the favored few—students, staff members, and colleagues —who in the ward, the lounge, his home library, or the meetings of societies so many of which he started, came into intimate contact with him were, by the magic of his unique personality, stimulated to search at the bedside, in the laboratory, the morgue, the library, for the truths of medicine both old and new. They were led, unconsciously perhaps, to appreciate the meaning of culture, scholarship, and character in the physician. They saw how one whose vocation was science and medicine could yet become famous as a man of letters and a lover of books. William Osler exemplified Lord Tweedsmuir's three qualities of greatness: humility, humor, humanity. Though unusually well informed, he was humble before the huge mass of new knowledge, only a portion of which could be grasped by any one man. His sense of humor, which made him conscious of the inconsistencies and frailties of himself and others, saved him from many a spell of deadening depression. He was humane, human. Essentially an aristocrat, he was yet democratic in his mode of life, tolerant and accepting all men as brothers. From him, his graduates, and staff there emanated an influence for good that lifted the practice of medicine over a wide area to a higher level than was before known.

His great contribution was his *Textbook on Medicine*. This has been rightly termed by Harvey Cushing "Osler's medical masterpiece." One might well defend the thesis that it was the greatest single contribution made by the Johns Hopkins Hospital or the Johns Hopkins Medical School. It was a carefully edited compendium of the essentials of medicine. Bewildering theories and unproved facts were omitted. Useless and harmful therapy was condemned. Unnecessary verbiage was deleted. In fine, it was practical medicine reduced to its lowest terms, stated in clear, direct language, yet so shot through with the individuality of the author and his sane judgment that it impressed the reader not as a mere compilation but as a carefully prepared summary that, like a lawyer's brief, presented the facts fully while at the same time, like a judge's charge, it interpreted them fairly.

Osler's was the best textbook ever offered to English-reading physicians. Like a breeze through an opened window of a room stifling with the drowsy burden of rebreathed air, it roused the profession to an appreciation of the truer meanings of scientific medicine. Furthermore, it was a potent connecting link between medicine and the public. It is a well-known fact that it had much to do in inducing laymen to contribute large sums to further medical research and to sustain efforts in this country and elsewhere to prevent and combat disease.

I have no desire to debate the question of the comparative merits of research as opposed to textbook authorship. If I were to attempt it, I fear I should make a poor showing in trying to prove that any textbook has benefited mankind as have the researches of a Galileo, a Harvey, a Newton, a Pasteur, a Koch, a Roentgen. But a strong case can be made out for the claim that most honorable mention may justly be accorded the author of a good textbook. And I would call in as a supporting witness William Rainey Harper, who, many years ago, said to me that though he himself was a devotee of research and the president of a university the major activity of which was original investigation, he was unwilling to say that the contribution of the one who sought for the new was of greater value than that of the

competent teacher or the writer of a genuinely good textbook who made known and interpreted the old. As I see it, such a service was rendered by the textbook of William Osler.

For several years before Dr. Osler left America for England, where he was to become Sir William Osler, we met not infrequently at sessions of the Association of American Physicians or the American Medical Association, perhaps at the banquet table. Acquaintance was kept up, also, through correspondence. As is well known, Osler was addicted to the "brief-note habit." There might be an encouraging word about a recently published article, a hint to be attentive to some former pupil of his who would soon be passing through Chicago, or a hope that I would be helpful to the recently appointed professor of medicine in a western medical school, for "he is a splendid fellow." There were more formal letters that were dictated and in which words were spelled in full and not abbreviated (to decipher some of his postals was almost like solving a cryptogram) about a mutual patient or some contribution to his *System of Medicine*. These contacts whether personal or by letters always showed his cordial, helpful spirit; his occasional quippish comments revealed a lively sense of humor. And my experience was by no means unique. Hundreds of other physicians were on his friendly "brief-note" mailing list.

Dr. Osler was not infallible as a practitioner or as a teacher. He had his share of mistakes in diagnosis and occasionally lapsed as a teacher. He had, too, some traits of character that if one were disposed to be hypercritical might be interpreted as revealing a weakness in his character. Thus, he enjoyed playing practical jokes on others but was almost childish in his resentment at a joke played on himself.

My acquaintance with Dr. Osler may be called intimate, though it was no more so than that of scores of other physicians in the United States, Canada, and Great Britain. He had the faculty of making friends. Only once did I feel that I had been admitted to an intimacy reserved for his closer friends. At a meeting of the American Medical Association held in 1902

at Saratoga Springs, I sat next to Dr. Osler in the Section on Physiology and Pathology. In those days the sections were small—less than a hundred were present on this occasion—and discussions were more informal and intimate than they are today, when the speaker from the raised platform, through the microphone, reads a carefully prepared "discussion" to an audience of perhaps a thousand. A paper was presented by Dr. Victor C. Vaughan, of Ann Arbor, on Ehrlich's side-chain theory, which was then a front-page subject in high-grade medical circles. Dr. Vaughan knew his subject. He drew on the blackboard the benzene ring; tacked on or took off a hydroxyl molecule here or something else there, talked of toxins, haptophores, etc. Dr. Osler listened intently, and then, as Dr. Vaughan closed, he turned to me and said seriously, wistfully, and pathetically, as I thought: "Herrick, I wish I were nineteen and had it all to do over again." Soon after this he went to Oxford. I have wondered whether one of the reasons why he left America at the relatively early age of fifty-seven was not his consciousness that he could no longer keep up with the rapid advances in medicine.

I cherish the mementos of William Osler: the brief notes, the initialed reprints, the autographed copy of Littré's *Médecine et Médecins*, which he and Gideon Wells sent me from England in 1905; his cordial invitation to stop when at Oxford as a guest at 13 Norham Gardens. I cherish the memory of this man who was great in learning and scholarship, great in an infectious personality that influenced for good all who came within its range. It was a rare privilege to know him.*

* William Osler, born April 12, 1849, in Ontario, Canada. At the Johns Hopkins Medical School, 1889–1905; at Oxford, England, 1905–19. Made baronet in 1911. Died December 29, 1919. Much of what is said here about Dr. Osler has—through the courtesy of its editor—been quoted from an article of mine that appeared in the *Bulletin of the History of Medicine*, X (1941), 136–47.

CHAPTER XII

War Work—World War I

My country, 'tis of thee.
"AMERICA"

IN JULY, 1917, the day after I had begun my summer vacation in Vermont, word came that I had been appointed chairman of Local Exemption Board No. 46, Chicago, and that I should report at once. Although this was not a peremptory order, the urge of patriotism was impelling. So, returning to Chicago, I accepted the appointment, signed my name to the necessary documents, and became a member of the military forces of the United States subject to orders of the Provost Marshal General. From July 5 to August 26, 1917, I was busy with local board duties.

Strangely, the board was made up of three doctors. One of these almost immediately resigned on account of ill health. The other, who had been named as secretary, took matters calmly, came to the board when it didn't interfere too much with private practice, coolly announced that he hadn't sought the job; if the government didn't like his way of doing things, they could fire him. He was of little help. My frantic appeals for the appointment of a nonmedical member were, for several weeks, fruitless. Seriously handicapped, though with some help from volunteer workers, we had to go through the distracting, turbulent days of hunting up suitable quarters (in Henrotin Hospital), securing equipment, getting the list of draftees in order, studying the many pamphlets of instruction that came from the Pro-

vost Marshal General's office, some of which were none too clear and were often changed, answering letters and telephone calls—all the time being told by the authorities to "hurry up, get busy; we've got to have an Army right away."

Finally, we announced that on a certain day the first quota of draftees—about seventy-five—was to report for the examination, which would be largely concerned with physical or health conditions. Board No. 46 was known as the "Gold Coast Board"; it included the many wealthy families of the Near North Side. As a matter of fact, no board in the city dealt with a more miscellaneous group than did No. 46, for west of Clark Street and extending to the river was the "melting-pot" of Chicago. Here were factories, large and small stores, boarding-houses, saloons, gambling dens, and houses of ill fame, with a nondescript mixture of people of all races, religions, and nationalities. By actual count our lists of draftees contained men from twenty-eight different nations. There were Greeks and Mexicans, Slavs and Scandinavians, Filipinos and Armenians. The toplofty English butler or the supercilious Japanese house servant, particularly if he had to strip for an examination, looked scornfully at the Negro Pullman porter or the Chinese laundryman, who was going through the ordeal at the same time. Verily, it was a motley group.

Those who went through those early days of the draft boards will recall the perplexities that were connected with the system of drawing the numbers by lot in Washington. While the system was fair, the application of it to the boards of different sizes throughout the country was complicated and led to much confusion. Only by very close study did we in our board finally manage to understand it. No wonder, then, that draftees were perplexed and that they occasionally charged us with unfairness. They suspected that there was discrimination against the poor man and the laborer in favor of the rich and the white-collar worker. Late one afternoon an intelligent laboring man protested that his draft number was high; his examination, therefore, should be postponed until those with lower numbers

were cared for; he hinted that the latter, especially if well-to-do, were favored. I explained to him the whole process of selection for service, but he was not convinced. Some listeners in the room evidently sided with the objector; others were with me. To my surprise, a stranger suddenly stepped forward and, facing the draftee, brusquely said: "This is my case; you come along with me; perhaps the Department of Justice—showing his star—can make you see what you pretend not to see now." I emphatically told the officer to keep out of it; it was not his affair; the man was honest, as an American citizen he had a right to ask questions; and, even though it might take until dark, I proposed to convince him that the procedure was fair. In about ten minutes the man saw through the intricate problem, thanked me for my courtesy, and quietly submitted to examination.

In another case a burly Belgian loudly declared that he was an American citizen, a Communist, a pacifist; he would not fight in the Army, but he was ready to fight then and there if we tried to examine him. He was belligerent and threatening. When he shouted, "I want to be treated like a man, not like a dog," two Department of Justice men grabbed him by the collar, saying, "All right, we'll treat you like a man, come along with us." This time I made no protest. What became of him I never learned.

At last, in answer to my repeated appeals, a nonmedical member was appointed: Mr. Charles S. Holt, a prominent attorney, who was unusually competent as an executive. I was relieved of much of the burden of work, which was the most fatiguing physically and trying nervously that I have ever undertaken.

I was often asked what were the striking differences between the young men of the Gold Coast and those from the slums. My reply was that when they stood stripped before me it was hard to tell them apart. The skin of each was clean, perhaps in preparation for the test. The cigarette stain on the finger was a common mark; the roughness of the hands might have come from

wielding the sledge or from swinging the golf or polo club; the callus on the foot might have been caused by the rub of the ill-fitting shoe of poverty or the pinch of the tight shoe of fashion. The stoop of the shoulder was found in the scholar, the white-collared proofreader or bookkeeper, the long-houred, underpaid tailor of the sweatshop. There were no identification marks in lungs, heart, or joints. "If you prick us, do we not bleed?" could have been said by all. Under the microscope the blood appeared the same.

There were differences of color, race, facies, mentality; differences in social views, ethical standards, reactions to war. Not all the liars came from the back streets, however, and not all the Socialists and Communists from the sweatshops or the ramshackle tenements. The most honest, most sensitive, and most modest individual whom I examined was a poor Jewish lad, who, in his early twenties, had an incurable form of cancer. The most unreasoning pacifist came from a Gold Coast home of wealth and culture. The wildest Communist was the intellectual Belgian already referred to, whose obstreperous threats of violence necessitated his being turned over to the Department of Justice. Loyalty, patriotism, courage to make sacrifice, of life if necessary, were found in all classes, as were cowardice, shirking of duty, even disloyalty.

On August 20, 1917, in answer to a telephone request from Governor Lowden, I left the local board and joined District Board No. 1 of the Northern District of Illinois, where I served until March, 1919.

There were three of these district or appeal boards in Cook County, No. 1 caring for forty-two wards in the southern part of Chicago; No. 2 the same number in the northern half of the city; and No. 3 the country towns. Each board was made up of five members—a chairman, a physician, a lawyer, together with one representative of the employers and one of the laboring men. Harry Pratt Judson, president of the University of Chicago, was chairman of our board. Theodore W. Robinson repre-

sented the employer, Victor Olander labor, Judge Jacob Hopkins the law (he was later replaced by Floyd Mechem, of the University of Chicago), and I medicine. Of this board I am the only member now left.

The change from the grueling work of the local board was most acceptable. In the district board things were done in a more orderly and leisurely way. We met at nine in the morning, adjourning about noon. President Judson was punctual and efficient as chairman, giving everyone a chance to express an opinion, yet tactfully cutting short irrelevant discussion. He aimed to be fair in every respect. Once a week there was a luncheon attended by the fifteen members of the three appeal boards. These meetings were illuminating and helpful. There was a comparison of notes, a free discussion of methods and results. Frank criticism was in order. There were occasionally sharp clashes of opinion, especially between the employer and the labor representatives. I recall the three labor representatives. John Fitzpatrick—his union I have forgotten—was fiery and explosive. According to him, no mercy should be shown a corporation that ran an open shop; no exceptions were there in order; all open-shop employers were crooked self-seekers, looking to their own money-making advantage and not at all inspired by patriotic motives. Olander, representing the sailors' union, was calmer, broader-minded. The least talkative of the three was Perkins, an Englishman by birth, I believe, who was from the cigar-makers' union. He seemed to me the shrewdest of the three. When he put in a word, he did it quietly, with something of an air of innocence, but at a time when it was most likely to score for labor. Once, as he asked the employers an awkward question, I caught his eye, and he surely signaled to me by a rather sly look, "Wasn't that a neat one?"

The appeals that came before our board were of every kind. Many had the ring of sincerity, others were palpably efforts to get out of military service by any method, no matter how devious or crooked it might be. There were appeals claiming non-American citizenship that were looked into by the lawyer.

Many appellants claimed they were engaged in occupations that were essential to the successful prosecution of the war. We agreed generally as to a railway engineer or a bona fide farmer; but what about the baggageman at a small railway station, the butcher boy on the train, or the farmer who had but a small half-acre of berries or green vegetables? What about bank clerks? Some of the claims on the score of dependency were clearly spurious and were promptly turned down. In many instances technicalities were waived, and a decision based on humanity and common sense was reached.

In a large proportion of cases the appeal was made on the score of health or physical disability. These were generally referred to me for investigation, the board nearly always approving my recommendations. At that time there was no intermediate advisory medical board between the local and the district board. This advisory body, later wisely created, cared for a large share of the claims for health exemption. It was my duty to examine personally some seven hundred individuals. This I did by daily notifying by postal card fifteen to thirty appellants to be at my office in the afternoon, where I looked into their cases. Decisions in many instances were easy—high blood pressure, excessive overweight, diabetes, valvular heart disease. Others were harder—slight heart murmurs, bad teeth, defective hearing or eyesight, nervous affections of various kinds, ulcer of the stomach or duodenum. Most of these I could handle alone or with the help of my office and hospital assistants, who examined urine and blood, took blood pressures, etc. For other cases I asked aid from friendly experts, and it was always cordially given. Dr. E. V. L. Brown examined many eyes for me and Hugh Patrick many nervous cases; surgeons and x-ray men shared in reaching conclusions in such cases as possible ulcer, gallstones, renal calculus, chronic appendicitis. No cases were more perplexing than the neurotics, whose condition often bordered on the psychotic state. Neurocirculatory asthenia, as it was later called, appeared in mild or exaggerated form. I am sure that it would have been better for the man and the service

had I oftener decided that one so afflicted was not only unfit to go into combat service but was almost worthless for even limited service. There was pathos, comedy, and tragedy in the case of a healthy-looking, physically strong man of twenty-five who on his knees tearfully begged me for God's sake not to send him into the Army; he could never undress before other men, from early childhood, when his father had died, he had slept with his mother; how could they get along without each other? And then there were the conscientious objectors who were physically fit!

The first three cases that I reviewed depressed and discouraged me. They revealed the hurry and confusion of the early days of the draft. Some local-board doctors who had been ordered to begin examining on a certain day had no printed directions to follow; some were not well qualified medically. Some who were resentful at having been criticized—at times very harshly—for slackness, would, with a careless and heartless attitude, report a man fit for unlimited service, saying, "Let the Army doctor decide for himself." The first appellant whom I examined was an overweight man, waterlogged, dyspneic, with blood pressure of 220, urine loaded with albumin. He reported that the local doctor had passed him with practically no examination at all. The second man was very deaf, with a perforated eardrum through which came a profuse discharge of offensive pus. According to the history, this condition had existed for many years. The third man's right elbow was ankylosed at an acute angle from an old accident. "Oh, you can shoot a gun all right," the doctor had told him, "at any rate you can try; you're in." These rank violations of official orders became less frequent as time went on and the rules of procedure of the selective service were more definitely stated and better understood by the local-board doctors. There was also some weeding-out of undesirable members of these boards.

The work was an interesting study of human nature in all its aspects. Individuals differed in their intelligence, their notions of patriotism, and their standards of honesty as much as

they differed in height, weight, or rate of heartbeat. In board meeting one day we were considering an appeal from a man of twenty-three, assistant cashier in a Loop bank, who had graduated from an eastern university two years before. According to affidavits of the higher officers of the bank, he was their credit man, without whom they would be lost; banking was essential to the prosecution of the war, etc. We discussed the case back and forth. Finally, Theodore Robinson, representing the capitalists, blurted out· "Great Scott! Are we to believe that if he were ill for six months or were to die today, the bank would go out of business? They would have someone in his place in five minutes. He's a kid just out of college. I move we deny the appeal." We so voted. We learned that within a week a prominent attorney went to Washington with a brief case bulging with affidavits. He saw someone high in authority and secured this man's exemption.

In my examinations made in the office surprises were common. Defects of eyesight that were often unsuspected by the drafted man were detected—congenital blindness in one eye or color blindness. Deceit concerning eyesight and hearing was attempted many times. My ophthalmological friends had equipped and trained me in the use of some cleverly devised color glasses that often trapped the malingerer; they showed me how to change the charts used for vision tests or to alter the distance. If a man were a malingerer, he would be thrown into hopeless confusion. One candidate insisted that he was completely deaf in one ear. With the good ear closed by my assistant, the man, standing at a distance of about fifteen feet, was unable to repeat words that I spoke. Gradually I raised my voice. He always shook his head, "No." Finally I fairly shouted. There was a negative shake. Then, dropping my voice to a low whisper, I said, "Do you mean to say you don't hear me?" "Honestly, doctor, I don't," he answered. My assistant was immensely tickled at the way the malingerer had been trapped.

The prize story illustrating malingering was told by Dr. M. L. Harris, who was the physician on District Board No. 2.

A young chap came before Dr. Harris with a claim for exemption on the ground of hernia. Dr. Harris, who was a man of few words and quite brusque in manner, said, "Let me see your rupture." "Vy, you got de affidavits from Dr. Goldstein and Dr. Cohn, haven't you? They are fine doctors; you must know them!"—with more to the same effect. Finally, Dr. Harris said: "Now see here, never mind about the doctors and the affidavits, *I want to see your rupture.*" "You mean I got to show it?" "Yes," emphatically, "that's what I mean." "Vell, doctor, if I have to show it den I ain't got it."

With the receipt of a certificate of honorable discharge, dated March 31, 1919, and signed by Governor Frank O. Lowden and Provost Marshal General E. H. Crowder, my war work ended.

One other experience may be related under the head of war work. It will be recalled that in 1918 a frightful epidemic of influenza swept the country. In hospitals and in private practice, physicians were all but overwhelmed in trying to meet the demands made upon them. At Presbyterian Hospital we were shocked by the heavy mortality of cases that came in. Often these patients entered only when it was realized, after one or two days, that proper care could not be given at home, or when the case seemed hopeless. At times the patient was moribund on admission. These patients were assigned to the doctors of the staff as private patients or to the services in the wards. Only crude attempts at segregation were made.

The condition was so serious that the superintendent of the hospital, representatives of the board of managers, the school of nursing, the faculty of Rush College, and the hospital medical staff decided, after a conference, that, while the hospital would care for as many outside patients as possible, special provision should be made for the care of nurses, medical students, interns, and the large number of hospital employees, scrubwomen, cooks, painters, clerks, elevator men, and others. To this end two floors were set apart, and I was asked to assume medical

charge of this special work. This I did, requesting that Dr. Clifford Grulee be designated as my assistant and Dr. Leland Shafer be the resident. We three laid down certain rules that seemed to us wise. The patient was to be put to bed at the very beginning of symptoms; he was to be kept there not only until pulse and temperature were normal but for a few days longer, or until the extreme weakness that was so characteristic of the illness had disappeared. No drugs were to be given unless some special symptom seemed particularly annoying or threatening —pain, sleeplessness, constipation, or marked heart weakness. This was carrying expectant or symptomatic treatment to the extreme. It seemed justified because there was no specific known. And we had seen the uselessness or harmful effects of the treatment, especially the drug treatment, that had prevailed before these patients had been put under the charge of one physician. Under the old regime, treatment had been most promiscuous. It was polypharmacy run riot—various attending men, assistants, residents, or interns ordering drugs in a way that was unscientific, useless, or harmful. The uniform plan that we three carried out brought results that seemed to prove that we were right. Out of more than 160 patients, many of them seriously ill, often with complications like pneumonia, only one, a nurse, died. This experience is described in a paper published in the *Journal of the American Medical Association*, **72**: 482–87, 1919, under the title "Treatment of Influenza by Means Other than Vaccines and Serums."

CHAPTER XIII

Miscellaneous Activities

In real life serious things and mere trifles
are wont to be mixed in strangest medley.

JOHN KEBLE

BY AN act of the state legislature, approved on June 22, 1917, provision was made for the creation of the Illinois Industrial Survey, which was to study and report on the condition of women in industry in the state, with special reference to health as influenced by hours of work. At Governor Lowden's request, I accepted the chairmanship of the commission, receiving my appointment in January, 1918. The other members were Milton S. Florsheim, of Chicago, and P. C. Withers, of Mount Vernon, representing the employers; Agnes Nestor and Elizabeth Maloney, of Chicago, representing women workers—Miss Nestor, who died in 1948, was from the glove-workers' union and Miss Maloney from the dishwashers' —and Drs. George W. Webster and Solomon Strouse.

The subject took much time. There were many meetings of the commission, many conferences with investigators, much study of literature in books, magazine articles, and reports of various bodies; we visited factories and talked with employers and employees

Finally, on November 30, 1918, the report was transmitted to the governor, the majority report being signed by all except

Mr. Florsheim and Mr. Withers, who presented a minority report.

In the introduction to the majority report, attention was called to the various studies that we had undertaken. There were statistics on the number and proportion of women workers and studies of the trend of the times as to hours of employment. There were questionnaires, opinions of physicians as to health as affected by hours, especially in larger manufacturing or mercantile houses, and opinions of other investigators along similar lines. We tried to determine the effect of fatigue of workers on rate of output and the incidence of accidents—to what extent fatigue was an element of danger or a handicap to the individual woman worker. The doctors discussed fatigue on a physiologic and pathologic basis. It was difficult to reach definite conclusions. Woman was not a machine; the human element—woman as the wife and mother—kept cropping up as an inescapable variable. The majority recommended that in Illinois, which then permitted a day of ten hours' work for women, a day of eight hours should be substituted.

Throughout the entire investigation it was evident that the two women representing union labor and the two employers had their minds pretty well made up before any study was made. But their divergence of opinion did not by any means connote dishonesty or necessarily extreme selfishness. The explanation was that the question was looked at from different points of view with, at times, a suspicion as to the motives of the other party. Mr. Florsheim made an illuminating and cogent remark when he said he would favor the short or eight-hour day for women under any one of three circumstances: (1) when he was convinced that production under eight hours equaled that under the longer day; (2) when there was a national law making a uniform eight-hour day for the entire country, so that manufacturers in one state could not (as he believed) produce, and therefore sell, more cheaply than those in another state; and (3) when it was shown to him that a day of more than eight hours was inhumane to the worker.

Since 1918, the date of this report, views as to labor of both sexes have materially changed, and now the eight-hour day is outmoded. How much influence was exerted by our report I do not know. It was often quoted in efforts to secure eight-hour-day legislation in the Illinois legislature, but favorable action of that body came rather late.

The report was published as a brochure of 120 pages under the title *Hours and Health of Women Workers: Report of Industrial Survey, December, 1918*, and was printed by authority of the state of Illinois (Springfield, 1919).

In 1928 Dr. William S. Thayer, then president of the American Medical Association, appointed me a member of the Judicial Council of that organization. This council, as its name implies, acted as a court of appeal, really a supreme court. Its important function was to pass on questions that involved infringement of the principles of ethics to which reputable physicians were supposed to adhere in their practice.

Much of the work was simple, a decision being readily reached by the unanimous or majority opinion of the five members of the board. Other cases were complicated; technical formalities had been violated; this called for more evidence by affidavits or by personal testimony taken before our body.

Several cases attracted much attention, particularly that of Dr. Louis E. Schmidt and the Public Health Institute of Chicago. After many months, during which a huge mass of testimony and documents had accumulated, the case came before our council. The Chicago Medical Society, that had instituted charges, was represented by one of its members—according to the by-laws of the American Medical Association, lay attorneys were not permitted to represent either party to a suit—and Louis Schmidt, though handicapped by deafness, refused to have any medical colleague represent him; like a doughty old warrior he stubbornly fought his own battle.

Without going into details, after the transcript of the testimony was in our hands, the Judicial Council voted three to two

in favor of Dr. Schmidt. A day or two later, Dr. J. N. Hall, of Denver, was granted permission to change his vote. So, Drs. Hall, Cregor, of Indianapolis, and McCrae, of Council Bluffs, voted that the charges be sustained. Dr. Follansbee, of Cleveland, the chairman of the council, and I dissented. Louis Schmidt was ousted as a member of the Chicago Medical Society and the American Medical Association; the Public Health Institute was officially declared nonethical because of its improper advertising, and all physicians in any way connected with it were notified that their fate would be that of Dr. Schmidt if they did not drop that connection. They ultimately resigned.

The publicity given the case advertised the Public Health Institute more than its paid advertising had ever done. Its lay supporters gradually modified their obnoxious scare advertising and got rid of some undesirable physicians on the staff. As I am writing these pages, word comes that after its several successful years the institute has disbanded, turning over its profits—a large sum—to Northwestern University. Louis Schmidt is still going strong at eighty. I have never regretted my action in the Louis Schmidt and Public Health Institute case.

The work on the council was interesting and enlightening. While it took considerable time for a few days every year, it was not very arduous. After six years, however, I was glad to retire.

For several years I was a member of the board of the John McCormick Institute for Infectious Diseases, which had been founded by Harold and Edith Rockefeller McCormick in memory of their son, who had died of scarlet fever, and which from its foundation in 1902 had had as its director Dr. Ludvig Hektoen. After the death of Dr. Billings in 1932, I became president of the board. My duties were not onerous; the real work was done by Dr. Hektoen, who acted as secretary.

The record of the institute and the associated Durand Hospital for Contagious Diseases, over whose medical service Dr.

George Weaver long was the efficient head, was excellent. Dr. Hektoen trained many workers in the ways of research. The *Journal of Infectious Diseases* was started and under his editorship immediately took high rank as a scientific publication. The brilliant work of Drs. George and Gladys Dick on the cause of scarlet fever, its clinical recognition and preventive and active treatment, which came to a climax in 1923–24, gave satisfaction to all interested in the institute as justifying its founding and management.

The institute, though on the West Side, was affiliated with the University of Chicago. Many reasons, geographic, economic, and educational, combined to make it seem best to transfer it to the university campus. This was done in 1941. Under altered forms its activities are still carried on at the university, where the John McCormick Fund goes to maintain research and clinical service in infectious diseases. With the transfer to the university, my connection with the McCormick Institute ended.

In 1917 several of us discussed the formation of a Central Interurban Clinical Club to be modeled after the Eastern Interurban Clinical Club. Our plans, interrupted by the war, were perfected in 1919. The first meeting was held in Chicago in December of that year. Dr. Frank Billings had been selected as our first president, but, owing to the recent death of his son-in-law, he felt he ought not to serve. At his suggestion, I was put in his place.

The club was limited to twenty-five members, chosen from clinicians living in Chicago, St. Louis, Iowa City, Minneapolis, and Rochester, Minnesota. Later Madison, Wisconsin, was added. Two meetings a year were held, each session lasting one or two days. The program was furnished by the local physicians in whose city the meeting was held. From the start the club was successful. Programs were devoted to new investigative work in internal medicine, often with demonstration of work that had a bearing on that subject from other departments, like anatomy,

physiology, pathology, and surgery. Patients were shown and methods of teaching illustrated by ward walks. Discussion was free and intimate. All members valued the meetings very highly for the new facts and new points of view that were acquired. It is still active, membership still eagerly sought for. The older living members are on the retired list. Largely through its instrumentality and chiefly through the efforts of Dr. Billings and Dr. Leonard Rowntree, the Central Society for Clinical Investigation was founded.

I mention briefly a few other organizations with which I was connected that, while partly social, were more or less closely related to medicine.

Soon after beginning general practice, I joined a West Side group of some fifteen physicians, who made up the Therapeutic Club. We met during the fall, winter, and spring at the homes of members, each one of whom had the opportunity of acting as host once a year. Subjects like the treatment of diphtheria, typhoid fever, and migraine were discussed; or drugs like mercury or opium might be the topic. Some of us were young and contributed the latest relevant facts we could glean from a search of the literature. Others, particularly some of the older men, rather scorned the youngsters, who, fresh from hospital internship and teaching in a college, seemed to underrate experience on which the elders dilated at length. Our sessions were often little more than experience meetings. When such a subject as constipation or the treatment of typhoid fever was taken up, the old-timers had their chance. Much of the talk was ridiculous and unscientific. Yet here and there practical suggestions were made that were helpful: "When in doubt throw in a little iodide of potassium"; or "I don't know what an 'alterative' is but add a little arsenic to your syrup of hypophosphite prescription and you'll get results." And Dr. R. N. Hall, one of the wiser ones, whose experience had started in the Civil War and whose practice, as he said, was not among the aristocrats who lived on Ashland Boulevard but among the collarless work-

ers on "Ferdinand Boulevard," a short street of poor shacks north of the tracks, contended humorously that for chronic bronchitis, asthma, or vague rheumatic pains he recommended a mixture of iodide of potassium, bromide of potassium, and Fowler's solution; "at any rate it's good for the Irish whom I treat," he would conclude.

The Physicians' Club was a social club with downtown meetings. Programs might be musical, literary, not strictly medical, though always offered by physicians who were members. I recall a delightful evening when Josef Zeisler read—giving an excellent offhand translation—one of Richard Leander's (Volkmann's) stories from his *An französischen Kaminen.*

Some time in the eighties a group of young South Side physicians formed the Chicago Medical Club. They aimed to be helpful to each other and met monthly for a good meal, to listen to a paper, and to exchange experiences. They dabbled a good deal in medical politics. The last members to be taken in were Otto Schmidt, Harry Favill, Arthur Dean Bevan, and myself. We were, in a sense, misfits. The older members were congenial pals, who reminisced, told the old stories, sang the old songs. We four, who had not grown up with them, could not enter into the spirit of the older men. I enjoyed many of the meetings, however, heard some good papers, and got an insight into the character of men I might not have known otherwise. It was finally decided that it would be wise to let the club die a natural death, no new members being admitted. As, one after another, members dropped off, the attendance grew smaller and the occasions more solemn, and meetings were held at longer intervals. Today I believe only Archibald Church in California, Rufus Bishop somewhere in Kentucky, and I are left. Bishop, by the way, was one of the best raconteurs I ever listened to. His rendering of French-Canadian stories and poems was artistic. Moreover, he was our executive secretary and treasurer, our gourmet-caterer. He saw to it that there was always

enough in the treasury to insure a good meal at a meeting or to send a wreath to the family of a deceased brother. Yes, Billings and McArthur, the Andrews brothers, Steele, Franklin Martin, John Ridlon, Frank Johnson, and others are gone, and Doering, who was the greatest enthusiast of all and a past master as a medical politician.

CHAPTER XIV

An Album of Medical Portraits

All, all are gone, the old familiar faces.

CHARLES LAMB

I TRUST that today I am sufficiently detached to pass sound judgment upon my old associates, their accomplishments and personalities, and their influence on the profession. Age has softened some prejudices that were clearly unjustified. In other instances later revelations have forced me to a sterner, more unfavorable verdict on men whom I had formerly regarded highly.

While the discussion has to do chiefly with those who were prominent as specialists, teachers, writers, or investigators, a tribute might well be paid to many of humbler rank who as general practitioners in our cities and villages faithfully carried on in the contest against disease. Like the doughboys in the Army these family doctors worked modestly yet efficiently, taking the hard knocks, often receiving scant praise while lavish praise was bestowed upon the college professor or the high official in a medical organization. I met many such men in the Northwest, and I am tempted to refer to some by name but refrain, lest others equally deserving be slighted.

A word concerning the old proverb, "Nil nisi bonum de mortuis." Is a writer bound by this fetish to limit his comments concerning the dead to eulogy only? Of course, he should indulge in no gossipy scandalmongering and no sensational muck-

raking; nor should he set down aught in malice. Inconsequential personalities should be taboo. The feelings of relatives who are living must be considered. But the "nil nisi bonum" dogma is, like so many other proverbs and slogans, only partially true. The unprejudiced reporter must tell the facts. Yet like an editor he may dispassionately and critically consider these facts and may be constrained to express an opinion that is not always favorable—or *bonum*. Furthermore, a man may deserve high rank in his profession because of valuable contributions to knowledge, though he may have most objectionable human failings. As someone has said, "The worst men often give the best advice." On the other hand, one whose scientific contribution may be relatively slight may be rated in the upper brackets because of the stimulating, beneficent influence of his personality.

Space requirements force me to make briefer mention than they deserve of three surgeons whom I came to know intimately —David W. Graham, Arthur Dean Bevan, and Dean D. Lewis.

Dr. Graham (1843–1925), of Scotch-Irish ancestry, a veteran of the Civil War, was connected with Presbyterian Hospital from its earliest years. The Scotch in his ancestry may explain a streak of canniness in his makeup, the Irish his pugnaciousness. His friends spoke of him as a persistent man, his critics called him stubborn. He certainly was hard to drive. He was an individualist, had his own way of doing things, and clung to beliefs and technics that seemed old-fashioned. He was repeatedly in disagreement with his colleagues. Yet his interns liked him, said they learned much from him, and warmly defended him against his high-brow, overscientific critics.

An incident that reveals some of these qualities may be mentioned. During a Chicago session of the American College of Surgeons, two men came into Rush College office, saying they were from a small city in the East. They had attended clinics given during the week by all the well-known Chicago men—Murphy, Ochsner, Bevan, McArthur, Harris, Andrews, and

others. "We have just spent two hours in the clinic of Dr. D. W. Graham. We had never heard of him before. But we wish to tell you, and hope you will tell him, that we heard more sound, practical, horse-sense surgery and less hot air there than in any other clinic."

Dr. Graham had many little tiffs with colleagues, the friction of which at times generated heat, though it rarely caused explosions. There was much kindliness beneath his rough exterior. I shall never forget how he let me down easy in a most embarrassing blunder of mine, a case in which I had wrongly diagnosed hypernephroma of the left kidney and had insisted on his operating. The mass was an enlarged spleen and not the kidney.

Much to the alarm of friends, Dr. Graham continued to operate even when handicapped by the infirmities of old age and the results of a cerebral accident. He was a warrior-type surgeon of the old school. He died in 1925, at eighty years of age.

In 1888, Arthur Dean Bevan, at the age of twenty-seven, joined the faculty of his alma mater, Rush, class of 1883, as professor of anatomy. Because of the attractive face of the youthful bachelor, the students promptly nicknamed him "Adonis." Later he was made head of the department of surgery in the college, and senior attending surgeon at the Presbyterian Hospital, positions which he held until shortly before his death.

Dr. Bevan thoroughly believed in himself. Uncle Remus might have called him "biggity." Like Dr. Graham, he always stood up for his rights. His colleagues sometimes smiled when he boasted that his department of surgery was the best in America. In spite of smiles and occasional squalls, he kept right on, gradually making changes and improving matters, with the result that during his long tenure of office there grew up in Rush College a group of young surgeons of outstanding ability, many of whom were called to head departments in other schools. Dr. Bevan's critics said these men were well trained and competent in spite of their chief. His friends said it

was because Dr. Bevan, though an arbitrary taskmaster and a veritable dictator, gave every man of promise a square deal and the opportunity to make good.

Dr. Bevan, though always appearing self-satisfied, was unconsciously steadily developing, growing more capable as an operator, better read, wiser, and broader-minded. When he came from Portland, Oregon, he was relatively inexperienced in surgical technic, tactless in dealing with colleagues, ignorant of many of the elementary principles of education, none too well informed on the literature of surgery. Though often at odds with his colleagues on college and hospital matters, he eventually earned their esteem. One of them said to me· "When I have a tough case for operation, I choose Bevan every time in preference to the youngsters; the old man has the goods."

From 1904 to 1928 Dr. Bevan was chairman of the Council on Medical Education and Hospitals of the American Medical Association. His growth in knowledge of educational matters was steady, and his grasp of the problems involved became firmer. The duties of this office, which required much time, personal investigation, and unflinching courage in exposing the deficiencies of weak schools, were well performed and earned general praise.

While not a scholarly writer, he made several worthy contributions to medical literature, some of which, like his papers on the surgery of the gall bladder and undescended testicle, were important original observations.

He was president of the American Medical Association in 1918 and of the American Surgical Association in 1932. One may indorse what was written in an obituary notice: "Dr. Bevan was a man of high character, absolutely fearless in the defense of what he considered to be right, and loyal and generous in his dealings with his colleagues." I may add that I never knew any other physician who was so frank as Dr. Bevan to acknowledge a mistake of any kind, such as an error in diagnosis or in the manner in which an operation had been performed.

He died June 10, 1943, at the age of eighty-two. He and his wife, Anna, left more than $1,000,000 to the Presbyterian Hospital, that for so long had been the scene of his labors.

My acquaintance with Dean Lewis began about 1900, when he was my intern in Cook County Hospital. He was a striking figure in his young manhood, erect, well proportioned, with eyes that looked squarely into yours. He was alert, energetic, dependable. Soon after his County service and while he was working as a demonstrator of anatomy at the University of Chicago, he surprised me by asking if he might become my assistant in private and hospital practice. He liked internal medicine, he said. At the time it did not seem feasible for me to grant his request. Nor did I think it right to encourage him to give up a position in which association with Dr. Llewellys Barker, who was then head of the department at the university, would qualify him for research, which was the fetish of the day. Had I known more of conditions under which he was working, how many of those imported from Baltimore preached rather than practiced research while Dean and Charlie Parker did the drudgery of teaching practical anatomy, I might have hesitated before turning down his application. Many years afterward he told me my rejection of his request was one of the keenest disappointments of his life. Yet today I think the training that he received in the details of practical anatomy was of the greatest help in preparing him for surgery, for which he was eminently qualified. He would never have been satisfied with the soberer, quieter life of an internist.

When later he came to Rush and the Presbyterian Hospital, we saw much of each other and were soon very chummy. We were associated in the care of many patients. We lunched together; often went to football games, where he was my cicerone, or to variety shows, always in the front rows, where I, forsooth, acted as chaperon. He was "hipped" on baseball. One of the proudest moments of his life was when Ty Cobb, the famous player of the Detroit team, consulted him about a sprained knee.

Through this acquaintance, Dean was at times invited to sit with the players and not in the bleachers.

But I was by no means his only intimate companion. A capacity for friendship was one of his striking characteristics. He had pals everywhere. As he became more widely known, his innate restlessness led him to travel, to read a paper in a western city, to attend a meeting in the East. He seemed to be forever on the go. A group of his friends once chose a traveling bag as the most appropriate gift for him. Wherever he went, he was hail-fellow-well-met. These "spellbinding" trips gave him a wide acquaintance. When in 1933 he was a successful candidate for president of the American Medical Association, he was assured of the votes of many delegates who knew him as the fine surgeon who had addressed their local society and who, as a good fellow, had hobnobbed with them at a big dinner or joined in a hunting expedition or a party at the circus.

As a surgeon and teacher he reminded me much of J. B. Murphy. He made rounds quickly. A patient remarked to me one day, "Before I had time to ask Dr. Lewis a question, he said 'Oh you're all right' and was out of the door." Like Murphy, he operated deftly and rapidly. He was a keen diagnostician. He had some of Murphy's uncanny judgment that often told him when to stop, when to leave something to nature. As a clinical teacher he imitated Murphy's Socratic method—consciously or not I do not know—quizzing the student, repeatedly asking him "why," and so on. But in two respects Dr. Murphy surpassed him. J. B. kept his clinical appointments. Dean was irregular, might fail to appear without giving notice that he would be absent, and leave Dr. Albert Montgomery, his clinical assistant, to get along with the clinic as best he could. Jim Harper, the registrar, said that in one year Dr. Lewis missed forty per cent of his college engagements. Also, unlike Dr. Murphy, he was prone to be sarcastic when quizzing a student and to make comments that hurt. It was a surprise to me to learn that "he was not liked by the students as a body; on the contrary, he was decidedly unpopular." Unlike Dr. Murphy

however, he never courted newspaper publicity, was never charged with unethical conduct, and was never accused of being commercial.

He was restless, rarely quiet. He chafed under restraint, was sensitive to criticism. After considering offers from various medical schools—I know of seven—he finally decided to leave Rush and the Presbyterian Hospital and accept the call to Johns Hopkins University. It was true, as Dr. Thayer said, that they needed some live wire like Dean Lewis to stir them up, to rejuvenate them; someone who would cut red tape and get things done promptly. He made an excellent record there, though his last years were made sad and tragic by ill health and other misfortunes. But in Baltimore, Chicago, and elsewhere, among doctors and his large clientele of patients, who were closely, even affectionately, attached to him, there was genuine sorrow when it was learned that Dean Lewis had died (1941) at the age of sixty-seven.

The story would be incomplete were no mention made of Dr. Lewis' many contributions to medicine, his informal stimulating addresses before various societies, his papers on the hypophysis and the surgery of nerves, his textbook on surgery.

Also he was the inspiring leader of Medical Unit 13 in World War I, the leader whose energy and tireless activity made it one of the outstanding groups of the war.

I pass over with but a bare mention of their names a few other worthy surgeons with whom I was fairly well acquainted: Willys Andrews, who had inherited from his father, Edmund Andrews, remarkable skill as a rapid, dexterous operator; L. L. McArthur and M. L. Harris, who had acquired the same skill by listening to and watching Moses Gunn at Rush. A. J. Ochsner, also, who had been one of Gunn's students and an assistant of Parkes, was an operator of the same type. Of him it might be said that he had become so skilled that he had lost all fear of the scalpel. This dangerous mental attitude was revealed to me one day at a consultation with him over a patient of his, a promi-

nent man in whom, after operation, a fever and other signs of infection had developed. I remarked that I was glad I was not a surgeon, for a case like this one would wreck me through worry. "Dr. Herrick," said Ochsner, "I never worry. I do the operation right. If the patient reacts badly or dies, it is not my fault." I looked at him in amazement; he was not joking. Such self-complacency I never met in any other physician or surgeon. I once heard a surgeon characterized as "competent, restrained, honest." Ochsner was competent, I always regarded him as honest; but he could not be called restrained.

There were many nonsurgical practitioners with whom I was acquainted, whose character and accomplishments deserve a more extended notice than can be given them in this volume.

Hugh T. Patrick was an unusually well-informed doctor, who by study abroad, extensive experience in practice, and a gift for writing terse, catchy English won high esteem as one of the leading neurologists of the country. He was outspoken in converse with colleagues and patients—his critics said, even to the point of rudeness. His defenders claimed that it was his inherent honesty that might boil over and cause him to show the door to a whining, neurotic patient who, he said, didn't need a doctor, making the exit easier and surer by a push or even a well-planted, though not very vigorous, kick. He was a teacher who stimulated students. Several neurologists of today gratefully acknowledge the value of the training which they received as his assistants.

John M. Dodson at various times held positions at Rush in the departments of anatomy, physiology, and pediatrics. Appointments to these chairs were due to his availability, book knowledge, and a gift of easy flow of language rather than to wisdom gained by experience at the bedside or in the laboratory. His best service to the college was rendered as dean of students. He mastered the details of the job, looked after the interests of the students, who, though they might smile at his clinics on pediatrics, liked him as their kindly friend in the college office.

William H. Wilder was my office companion for many years. He was highly regarded as an ophthalmologist and was active in state and national organizations, such as the Illinois Society for the Prevention of Blindness and the National Board of Certification of Ophthalmologists. He was a stickler for details and argued earnestly, even testily, for his own views. To listen to him and John Dodson debate about the proper interpretation of a golf rule was like hearing two advocates wrangle in court over the fine points in a law case.

Harry Gideon Wells, for long the brilliant professor of pathology at the University of Chicago and director of the Sprague Institute, was another famous character on the golf links. His flow of words was amazing. He explained in detail his poor shots and was effusive over his good ones. He reviewed his game of the week before. This habit of his irked some of the other players, one of whom said to me one day that he would accept my invitation to go for a game provided neither Wilder nor Wells was to be in the foursome; the cantankerous arguing of the one and the incessant gabble of the other got on his nerves and spoiled an afternoon's pleasure. Wells was a brilliant didactic teacher, an excellent practical pathologist, a good investigator. His volume on *Chemical Pathology* was a pioneer textbook on the subject. He was likable, had a keen sense of humor and a rich fund of stories. He loved sports—golf, fishing, trapshooting. For the last ten years of his life he was obliged to curtail his activities because of illness, but to the end he was never idle.

E. R. Le Count, by steady plodding, made a name for himself as an expert in pathologic anatomy. He was known as an odd character, tactless and stubborn, a man of few words, and sometimes spoken of as a "kicker." He was a hard taskmaster with students and assistants. The former were often severe in their condemnation of him, the latter were his loyal admirers and defenders because he taught them much. With all his peculiarities he was warm at heart. He survived a serious heart attack that caused him for a long time to give up work. After seven years,

a recurrence, necessitating a long hospitalization, ended fatally. A fine museum of pathological specimens at Rush and a valuable collection of bound volumes of histories, with drawings, of skull fractures based on his experience as coroner's physician are witness to his scientific zeal and industry.

Bertram W. Sippy is well known in connection with gastro-intestinal diseases and especially for his treatment of duodenal ulcer—the "Sippy treatment." He was an enthusiastic, tireless, yet unsystematic, worker. He was ambitious for a large practice, had four assistants in his employ, with patients scattered in three or four hospitals. In spite of physical ailments, the most serious of which was a high blood pressure, he never gave up his strenuous work, never took vacations until a year or two before his death, when he relaxed for a few days in summer on his huge Michigan farm of some fourteen thousand acres—the farm that was called by the Michigan people the "city man's farm" —in which he had sunk thousands of dollars. It was there that he met a sudden death from a massive cerebral hemorrhage. His was a lovable nature. Everybody liked him in spite of his garrulity, his needless repetitions of medical truisms, his lack of promptness.

As I am writing these pages, word comes that two of my intimate friends have left us, Peter Bassoe and Fred M. Smith. Bassoe was a man of high ideals, practical, a clear thinker, a good teacher, an effective writer. He was known for his work in pathology, neurology, and psychiatry. He was modest, yet forceful; learned, but without pedantry. His death at seventy-one from coronary thrombosis was a loss keenly felt by his many friends, who rated him highly for what he did and had an abiding affection for him for what he was.

For several years Fred M. Smith was my office and hospital assistant. He had learned on the farm how to work hard, the real secret of success. He had in him the urge to know more. In his intern days in the Presbyterian Hospital, while the other boys might spend their spare hours in playing pool or poker, Fred studied. He so impressed Dr. George Shambaugh, with whom

he had a service, that, in recommending him to me as a good man for assistant, Dr. Shambaugh wrote—I ran across the letter a few days ago—that Fred was the best intern he had ever had, one whose future, he predicted, would be brilliant.

Dr. Smith shared my interest in disease of the coronary artery. He did experimental work at first under my suggestion, then independently. He was a good clinician, a good research man, an effective teacher. He made a fine record as head of the department of internal medicine at the University of Iowa. For seven years he edited the *American Heart Journal*. Other honors came to him; he was a member of the Council of the Association of American Physicians, chairman of the Section on Medicine of the American Medical Association, president of the Central Society for Clinical Investigation. In 1941 he had an acute attack of coronary thrombosis. A recurrence in February, 1946, was rapidly fatal. Like Bassoe, he was a capable, modest man, respected for his accomplishments, liked by all for his joy in life, his affability, and his unfailing honesty. To me his loss is as though one of my own family had been taken.

Three dermatologists whom I knew deserve mention.

James Nevins Hyde, the pioneer dermatologist in the Northwest, was well known for his excellent textbook and for his brilliantly conducted clinics at Rush. He was dapper in dress and manner; scholarly, though rather flowery, in his talk. He was one of the best friends I had on the Rush faculty. I was his clinical assistant and for one summer vacation helped in his office.

Josef Zeisler came from Vienna to Chicago about 1890. His accomplishments as a musician and a student of German literature made him a welcome addition on social occasions. There were many stories told about Dr. Zeisler to illustrate the condescension of foreigners, and in particular the quite exalted ego of a dermatologist who had been trained in the school of Hebra and Kaposi.

I was very intimate with, and had a warm affection for, William Allen Pusey. At one time he was president of the American Medical Association and he was for twenty-five years

editor of the *Archives of Dermatology and Syphilology*. In a special Pusey number of this journal, January, 1937, are many details concerning him that are not touched upon here. His early therapeutic use of x-rays and his discovery of the value of frozen carbon dioxide in treatment gave him international renown. He wrote a successful textbook on dermatology and short histories of dermatology and of syphilis. He was a brilliant conversationalist and a littérateur of no mean ability. He was much interested in his home state of Kentucky and wrote several papers regarding it, some of which were presented to the Filson Society.

E. Fletcher Ingals, who succeeded Dr. Ross at Rush, was lacking in scholarly polish and was none too scientific. He was looked upon by many as narrow, selfish, and as factually minded as Gradgrind. Yet he was zealous for the interests of Rush and farsighted in some of his views of medicine. He had much to do with the plan for the union of Rush and the University of Chicago and with the formation of the Institute of Medicine. He was a hard worker in his specialty of laryngology and chest diseases and early saw the advantages of bronchoscopy and introduced it to Chicago.

Dr. I. N. Danforth's influence was always in the direction of improvement in teaching and in the work of hospital and private practice. He early employed the microscope. In his later years he devoted much of his attention to diseases of the kidneys. He was kindly, helpful to the young, tolerant toward those with whom he did not agree, and had a sense of humor and a fund of reminiscent anecdotes that made him a congenial companion.

In these pages, especially in connection with Cook County Hospital, there is frequent reference to Dr. Norman Bridge, his encouraging words to interns, his early recognition of the surgical aspects of acute appendicitis, etc. He was much in demand by younger physicians, who appreciated both his professional opinion and the considerate manner in which it was offered. He was truly the young doctor's friend.

As a teacher, the students thought him unnecessarily slow.

In the spring course in 1886 in which he lectured on medicine he devoted six lectures to general pathology. He took up only inflammation, managing to tell with many details how the leukocytes squeezed through the wall of the capillary, how an abscess was formed and then broke and healed spontaneously; he explained the meaning of a scar. Then he switched off to a discussion of eruptive fevers. The significance of all this is that at that time (1886) this was the only teaching in Rush College that told of modern pathology. A. J. Ochsner with his microscope did not come until the next year. Senn, Fenger, and Hektoen came still later. Dr. Bridge's teaching, fragmentary as it was, was, for us, pioneer; in addition, it was sound and thorough.

In his lectures on typhoid fever we wished he would speed up a little and be explicit. Dr. Quine at the Physicians and Surgeons College, with emphatic oratory, drew a picture with such clear outlines that no student who heard him had the slightest doubt that the disease could be easily diagnosed by the typical temperature curve, the palpable spleen on the seventh day, the abundant spots on the eighth, etc. Dr. Bridge left us bewildered; the fever was sometimes erratic, you could not always feel the spleen, spots might be few and hard to identify. Now it was a good thing for us to have in our minds a picture of a typical case as drawn by Dr. Quine. Yet, as we got out into practice, we saw that Dr. Bridge had been holding the mirror up to nature and had stated facts as they really were.

In his clinics, which were on ambulatory patients, Dr. Bridge taught us the method of eliciting the history of the disease and its value as an aid to diagnosis. We learned by his example that no patient was so poor or ignorant as to forfeit the right to courtesy on the part of the physician. We learned that there is a drugless management of certain types of illness and were told of a natural tendency of disease toward recovery.

I shall never forget the day when, in December, 1890, Dr. Bridge in his office, which was in the basement of his home on Jackson Boulevard, said to me: "Dr. Herrick, those bacilli that I showed you under the microscope yesterday were mine. An

old tuberculosis has flared up. In a few days I shall leave Chicago never to return." I was all but overcome by the tragedy and the sense of personal loss. Today the thought is rather one of admiration for the man, who, confronted with what seemed a catastrophe, met it philosophically, uncomplainingly, and courageously. "Lucky discovery of bacilli," we may exclaim when we realize that it meant the recovery of health and the resumption of practice; meant later, through association with Doheny and investment in oil, the acquisition of great wealth, which enabled him to make most generous gifts to institutions in California and to the University of Chicago and Rush.

Dr. Bridge was simple in his tastes. He enjoyed good literature and wrote several booklets of essays, some of which are charming. They reveal him as a philosopher who enjoyed contact with other people, the study of whose whims and peculiarities gave him pleasure. His autobiography, *The Marching Years*, is a most interesting work.

He may not himself have been conscious of it, but there was a good deal of the hero-worshiper in him. A big political gun, a literary lion, or a man of great wealth attracted him. He liked to hobnob with such men and delighted to tell some story that Melville Stone or A. C. Bartlett or Doheny had told him. Those who knew the inside history of Doheny's career have assured me that Dr. Bridge, while profiting from doings that were later regarded as nonethical or venal, was himself, for a long time at least, ignorant of what later came to be called the "oil scandal."

Dr. Bridge died January 10, 1925, at the age of eighty-one, respected and honored for what he had done and for what he was.

Henry M. Lyman possessed encyclopedic knowledge, which unfortunately he applied in an impractical way. He was of sterling integrity and a neurologist of note. His dreams of success never materialized because he was too much of a recluse and lacked the qualities of leadership. Ill health and other misfortunes made his last days unhappy. His name might appropriately be included in the list of those whose early promise of success was never completely fulfilled.

Walter S. Haines, our chemist at Rush, was the youngest of the faculty of twelve full professors—"Benjamin, youngest and best beloved of the flock," President Allen called him. He was held in affection by the students because of his spirit of self-sacrifice and his patience in trying to make the poorest of their number understand. He was admired by all for his courageous struggle against ill health, pitied for the necessity he was under to work day after day as an inadequately paid teacher and toxicologist. Yet he outlived the eleven other colleagues, and when he died, an old bachelor, to everyone's surprise he left $200,000 in sound securities!

He was known in the courts as a toxicologist who was so fair in his testimony, so meticulously accurate in his work, that his statements as to facts were never questioned and only rarely were his conclusions disputed by the lawyers. On one occasion, however, when he had testified that the amount of poison found in the stomach was such that one could not state positively that it had or had not caused death, a young, inexperienced attorney, not knowing Dr. Haines, naggingly ridiculed him. "You claim to be a man of science, and science is accurate and definite, is it not?" "Yes, sir," meekly said Professor Haines. "Well, is there anything definite you would be willing to swear to? You would say, would you not, that two and two is four?" "No, I would not," was the quiet answer. "Well, Professor Haines, what *would* you say?" "I would say two and two *are* four." Judge, jury, other lawyers, and listeners joined in the burst of laughter that swept the cross-examiner in confusion to his seat. Some weeks after the court episode I jokingly asked the doctor if the story as told was true. "Dr. Herrick, it is true, and I still feel ashamed and chagrined that I lost my temper and made such a discourteous reply." Peace to his ashes! He had the kindly spirit of the highborn gentleman. "He was a verray parfit gentil knight."

It was my good fortune to have a more than casual acquaintance with George H. Simmons, who for twenty-five years (1899–1924) was editor of the *Journal of the American Medical*

Association and for most of this period the secretary and general manager of the association as well. Under him the *Journal*'s editorials improved. It demanded higher standards for articles before accepting them for publication, refused to open its advertising pages to the exploitation of secret or patent medicines or instruments of doubtful value. In its fight against nostrum-mongers it established the Council on Pharmacy. It backed the efforts to raise educational standards and to close proprietary schools of medicine by creating the Council on Medical Education and Hospitals. In all these and many more enterprises Dr. Simmons was a leader, often the initiator of the movement. He was fearless, persistent, farseeing. Though there were attacks from many sides—including vicious, slanderous, personal attacks—he never wavered. The association was reorganized; the *Journal* grew in size and improved in quality, special journals were started. The association became the largest medical organization in the world, and its *Journal* had the largest subscription list of any of its scientific type.

When Dr. Simmons retired at seventy-two, he was generally recognized as a great—a very great—medical editor and a superior organizer and executive. From his home in Florida he returned yearly to attend the meetings of the association, where he was always a welcome guest.

My remembrance of many meetings with Dr. Simmons, refreshed by several letters that I still keep, reveals him as a very human man, with a quiet sense of humor, a man proud of his accomplishments, who kept himself well informed concerning medical matters in this and other countries and who was keenly critical of some of the changes that were taking place. In the years of his activity, when overworked, he had at times been rather harsh in his treatment of his associates and subordinates. Relaxation, leisure, and time, however, mellowed him, and he became more tolerant. Yet occasionally, as I saw him in his Florida home or had a letter from him, he showed anxiety as to the wisdom of some things done even in his own association. It was a cause of regret to me that at the time of his death in

Chicago I was absent in Canada and unable to be present at his funeral.

In the late seventies there came to Chicago from a Wisconsin farm one who was destined to be for several years the undisputed head of Chicago medicine and who, after Osler's removal to England in 1905, was regarded by many—and, I think, correctly—as the medical dean of the nation. Frank Billings, after graduation from Chicago Medical College in 1881, served as intern in the County Hospital and then took postgraduate work in Europe. On his return to Chicago he began general practice and taught at his Alma Mater. In 1898 he came to Rush, was soon dean. He was the dominant man on the faculty until his retirement in 1920.

Success came to him rapidly. His rugged physique, his strong face, his directness of approach, his unassuming confidence in himself, and his evident honesty made an immediate and irresistible appeal to students, colleagues, and patients of every class. He was not above treating the poor and was not awed by wealth or social position. The captain of industry and the lady of fashion received advice or took orders from one whom they instinctively recognized as the master; what is more, these orders were obeyed.

Dr. Billings was a born leader. He might be able to walk as a companion in leadership, but it was hard or impossible for him to follow. He instinctively forged ahead. Many times he took the lead without realizing it. Once in a meeting of the Presbyterian Hospital medical staff Dr. Billings made eighteen out of twenty-three motions. Had he been told of this, he would have denied the truth of the statement. Had it been proved to him by a reference to the minutes, he would have been mortified. On one occasion he called a meeting of those of professorial rank in his department of medicine, saying that he had decided to start small clinics in the County Hospital, that he had appointed the instructors, that students had been registered, and the classes had been going for a week. The meeting, he said, was for the purpose of considering this plan, and "seeing what the

department thinks about the advisability of adopting it." He did not understand why some of us smiled at being asked to discuss what had been decided upon by the chief and what was already an accomplished fact. The incident is reminiscent of some of the acts of Theodore Roosevelt, apparently based on the motto "Do it first, get indorsement later." This genius for leadership was so marked that had he chosen business or any other profession than medicine he would have been a leader—a distinguished member of the bar, head of a railway system, a great captain of industry, an outstanding political figure, or a statesman of national proportions.

No physician in Chicago ever had such a hold on men of wealth as had Frank Billings. He asked for money for enterprises in which he was interested and got it. His advice was sought by would-be donors, who realized that his aims were not selfish. He was trying to better medical education, to further research, to improve facilities for the care of the unfortunate cripple, the needy invalid, the ostracized colored man. The McCormick Institute, the Sprague Institute, Presbyterian Hospital, Rush, the University of Chicago, are indebted to him for much material help. Especially at the university it may be said: "If you seek his monument, look about you."

The long story of some thirty years' effort to carry out President Harper's and Dr. Billings' plan for organic union of Rush, Presbyterian Hospital, and university will not be rehearsed here. Had President Harper lived, the result might have been different.

Dr. Billings was a good judge of men, he was shrewd and could pull wires. He was active in the American Medical Association, a warm friend of George Simmons, who for long was the leader of that organization. He, like Moses Gunn, was either for or against one. As an admirer of his expressed it, with Billings, "a man is either one of the finest fellows in the world or he is a ———. It all depends on whether one is with him or against him."

His was a kindly nature. He kept close to young men, stimu-

lated them, gave them opportunities, encouraged them. He, in turn, was stimulated by them. Many today are rightly classed as of the "Billings school." The affection and esteem in which he was held is perpetuated in the Billings Club of today.

The medical history of Chicago contains on its roster the names of three great men of surpassing influence: Daniel Brainard, N. S. Davis, Christian Fenger. To that list will probably be added the name of Frank Billings.

Dr. Billings died September 20, 1932. Over the last few years of his life when he gave up his medical activity—as I think, too early—and when the signs of old age appeared, a veil may be drawn. But what he meant to Chicago medicine for some thirty years was expressed by one of his younger associates, who once said to me: "Oh boy! In those days he was a humdinger."

For a more complete portrayal of Dr. Billings one may consult the special memorial booklet published by the Billings Club of Chicago in 1933. I trust, also, that there will soon be available the biography of Dr. Billings, which is, as I understand, being written by his former assistant and associate, Dr. Joseph A. Capps.

I insert here a few words concerning two men of note of whom I had but fleeting glimpses, yet who in memory are recalled as vividly as though they were seen yesterday instead of several decades ago. One of these was Helmholtz. During the World's Fair in Chicago in 1893, a dinner was given to distinguished men of science who had been sent by their governments to represent their countries at this Columbian Exposition. How I, a youngster of thirty-two, came to be invited on that occasion I have never known. But there I was, sitting next to a nice old gentleman, Ernest Hart, not realizing the important role he was playing as editor of the *British Medical Journal*. I cannot recall a single word that was said at this banquet or who the speakers were. What I do remember is that across the table sat Hermann von Helmholtz, one of the delegates from Germany, whose face irresistibly attracted me and held my gaze. The massive head, like Webster's or Bismarck's, betokened in-

tellect, dignity, poise, power. The eyes particularly are unforgettable. At the time I knew little about him except that he had devised the ophthalmoscope. Later, as I learned more of his fundamental contributions to science, I realized that I had seen one of the giants of the former generation. He died the following year.

The other man to whom I refer was Theobald Smith. In 1928, when he was sixty-nine, he was president of the fourteenth Congress of American Physicians and Surgeons. On invitation of the program committee, I read a short paper at one of the sessions at which Dr. Smith presided. We had met before but were in no sense well acquainted. My paper, entitled "Comments on the Treatment of Heart Disease," was written in an unconventional, familiar style and made no attempt to present the latest scientific facts concerning the subject. It was really a plea for common sense in the way of treatment. Its whole tenor and especially its semihumorous close came, I believe, as a surprise to the audience, which gave me a generous round of applause. As, bowing to the presiding officer, I left the platform, Dr. Smith gave me a quizzical look and a friendly smile that seemed to imply: "Well, I never knew before that you were that kind of fellow." It was as though we had suddenly become acquainted.

It was some time before I became fully aware of the greatness of this quiet, unassuming man and of his pioneer investigations that made him internationally famous. In 1938 I was president of this same Congress of Physicians and Surgeons. In preparation for my address I read all the addresses of past presidents, fifteen in number, from the first by John S. Billings in 1888 to the preceding one by Harvey Cushing in 1933. There was no question in my mind that the address made by Theobald Smith in 1928 on "Decline in Infectious Disease in Its Relation to Modern Medicine" was, in content, broad grasp of the subject, conciseness, clarity of style, and suitability to the occasion, far ahead—and by a long distance—of the addresses of any of his predecessors or the two who had succeeded him. In this

list were such men as William H. Welch, the Mayo brothers, S. Weir Mitchell, Osler, Trudeau, and others. Though I saw him but a few times and never knew him intimately, it is a pleasure to recall how, as if by chance, nearly twenty years ago I met in friendly manner one of our foremost American investigators.

CHAPTER XV

Old Age

Keine Kunst ist's alt zu werden,
Es ist Kunst, es zu ertragen.

GOETHE

AUGUST 11, 1948! I am eighty-seven today, an old man. I see it in the mirror, feel it in bones and muscles, am conscious of it in the unreliable and uncertain activity of the brain. When did all this start? Warthin in his excellent book on *Old Age* says that, even from birth, the cells and tissues of the body begin to degenerate, though up to the period of the climacteric—say, about fifty—growth and regeneration outpace the breaking-down process. After this time the familiar telltale signs appear and people whisper, "He is growing old."

I was first referred to as an old man some thirty years ago. I was standing in the aisle of a crowded elevated car when a young chap, a workman by his dress, looked up beerily and said, "Take my seat." I demurred; I was going but a short distance farther. Rising and with an injured air as though I had impugned his sense of politeness, he protested loudly: "Now you sit down; I never get so drunk that I don't know enough to give my seat to a lady or a old gentleman." I took the proffered seat. He, hanging to the strap and swaying this way and that with the motion of the car, kept muttering, much to the amusement of the other passengers, "Yes sir, to a lady or old gentleman; I say to a *old gentleman.*"

Now, in spite of Cato, who learned Greek at ninety, and of Mr. Justice Holmes, who in his eighties delivered dissenting opinions, which were not, however, so well worded or so logical as his earlier ones; in spite of Cicero, who, with literary charm and with the shrewdness and skill of the trained advocate, wrote a brief for the amenities of old age; in spite of these and other proponents, I don't like old age and am not afraid to say so. Samuel Johnson was about right when he referred to old age as a period "in which there is much to be evidenced and little to be enjoyed."

I am not resentful when some young fellow helps me on with my overcoat or when, on the platform of the streetcar, the conductor stretches out a protecting arm to keep me from losing my balance as the car starts with a jerk. There is no resentment, at all. What irks me is that I am thankful for these kindly attentions, though they humiliate me, as I realize that my decrepitude is so evident to all who see me. Perhaps some of us are like Chesterfield, who in his old age said: "Tyrawley and I have been dead these two years, but we do not choose to have it known."

There is another feature about old age that I don't like. It is the loss of memory for recent events. For years my memory was excellent. As a young practitioner I remembered what Willie's temperature was yesterday, what medicine I had given grandma the week before; reminded the neurotic girl that the symptoms she complained about today were the same as those of three months ago. I could remember medical articles I had read, the authors' names, the titles, the journals, often the very place on the page where some item of special interest was recorded.

An incident may illustrate my early retentiveness of memory. At a medical meeting in Iowa several Rush graduates greeted me as one of their old professors. One man said: "You will not remember me, but I am Dr. L. of the class of 1891." I replied: "On the contrary, I remember you very well. I took care of you when you had mumps and lived in a frame house on Paulina

Street just south of Ogden Avenue. Your bed was in the southwest corner of the room on the second floor. When your temperature rose to 105°, I sent for your father." Dr. L. looked at me in astonishment and said to the other doctors who were listening: "Gentlemen, this is a most remarkable feat of memory. Every word Dr. Herrick says is true." Turning to me, "How do you remember details so well?" My answer was that at that time I was a young man on the faculty. To have been selected to care for a senior student was an honor that surprised me. When, with the supposedly mild disease of mumps, my patient became delirious and ran a high temperature, this surprised me still more. When I read in the books that occasionally there were serious cerebral complications, I was not only surprised, I was alarmed and telegraphed the father. My explanation to the doctor was that a striking or startling occurrence in the impressionable days of youth may make a dent in the tablet of one's memory that is not obliterated by the lapse of twenty or thirty years. I have recently run across this idea better expressed by Daniel Drake, who describes how a sudden sharp reprimand by his father was the mordant that fixed an incident indelibly in memory.

Many events of years gone by are still clearly recalled. Yet, while the face of the patient who comes to the office today may be familiar, his name escapes me. Though he consulted me but a week ago, I must look at the history sheet to recall his illness. It is decidedly embarrassing. There is little comfort in knowing that even in ancient times physicians commented on the fact that with old age the memory for recent events is poor. Adolf Kussmaul put it into verse:

> Längst Vergangenes liegt mir nah,
> Als ob gestern es geschah,
> Das was gestern sich begeben,
> Will mir heute schon entschweben.

Yes, it has to be borne, but unfortunately I do not endure it with serenity.

It is interesting to note how differently men react under these

circumstances. Some accept the change graciously; others, not so resigned, are boastful. Meeting on the street the former president of a large business house in Chicago, I congratulated him on his apparent good health at eighty, his elastic, energetic step. "Doctor," he said, pushing out his chest and thumping it vigorously with his fist, "I am on the job every day at ten; I am virtually the head of the firm." A few days later I commented to a junior partner how nice it was that Mr. M., though relieved of much of the heavier work, still directed the affairs of the store. He looked at me rather quizzically and replied, "Yes, Mr. M. still has a desk in the office."

It is strange how some people try to conceal their age as though it was a disgrace to grow old. The doctor with whom I was seeing a maiden lady in Memphis said that he had never been able to find out her age; she was probably about seventy; perhaps she would tell me. When, as I thought tactfully and with seeming casualness, I remarked, "And may I ask your age?" she replied with the old-time ante bellum courtesy of the genuine southern lady, "Doctah I am of mature yeahs." I never got any closer.

Mr. and Mrs. F. had been patients of mine for many years. He had retired after a successful career in business. One day, when he was close to eighty and she was eighty-four, he brought her to the office. I expressed surprise that he had come down town by the elevated road, making his wife climb the stairs, which had put her very much out of breath; he ought to take an automobile or at least travel by surface-line streetcar or bus. After my examination he said: "Doctor, I wish you would tell me frankly what ails Mrs. F.; you have never put a name on her disease." As gently as I could I answered: "Well, her trouble is made up of many little ailments. You know she has had diabetes for a long time; this had much to do with the gangrene of the foot that necessitated the amputation above the knee; it also explains the cataract. She is deaf; she has albumin as well as sugar in the urine; her arteries are hardened; she has a high blood pressure. The heart is enlarged, its muscle is weak, which

explains the irregularity of the pulse and her breathlessness. And then, Mr. F., we must remember that Mrs. F. is no longer young." At this he suddenly flared up and with ill-concealed anger burst forth: "Dr. Herrick, if you mean to imply that any of my wife's trouble is due to old age, I resent it as an insult. Her mind is as clear as it ever was." Poor man! he still saw before him the young bride of sixty years ago. They had grown old together; they were still lovers. Both of them died soon after they were in my office, and some other physician wrote the death certificates.

Is it not strange that an octogenarian, especially a physician who knows so well that death cannot be far away, instead of living in memories of the past, persists in trying to be active in the present and still looks forward to the future? Each year he has been obliged to give up certain tasks, yet every day he continues to do a little, trying to make himself and others think that he is still busy. In the city he runs an errand to the store; in the country he pulls a few weeds in the garden or gathers the ripe tomatoes. He is like an elderly friend, who confided to me: "Well, I've had to stop mowing the lawn and caring for the furnace. But," with a pathetic touch of humor, "I still wind the clock every Sunday morning."

Yes, even at four score and seven I plan tomorrow or next year to do something that is worth while. It recalls the spirit of Tennyson's Ulysses, who could say to his fellow-mariners:

> "you and I are old;
> Old age has yet his honor and his toil;
> Death closes all: but something ere the end,
> Some work of noble note, may yet be done."

But things are not so bad, after all; they might be worse. Why not, like the sundial in the garden, count only the sunny hours? Hearing is dull but I can still hear the voices of the birds and the laughter of children. Eyesight enables me to see the mountains and the flowers in the garden of my Vermont summer home and to read a clearly printed page. I never miss the

death notices and weather report in the papers. I have to grope more than before to get the right word; it is harder to follow a connected train of thought, to avoid garrulity and repetitions, but I am not—so I am told—in the stage of senile dementia. It was Goethe who wrote:

> Keine Kunst ist's alt zu werden,
> Es ist Kunst es zu ertragen,

which, freely translated, reads: "No skill or art is needed to grow old; the trick is to endure it." Aye, there's the rub—to carry easily the burden of years. Many there are who essay the task; few there are who succeed.

I trust I may be pardoned if, in digression, I refer to my favorite discourse on old age: Ecclesiastes or the Preacher. As a boy I was fond of this book in the Bible. I memorized the twelfth chapter "Remember now thy Creator in the days of thy youth, while the evil days come not, nor the years draw nigh, when thou shalt say, I have no pleasure in them." Though I was perplexed by some of the figurative language: "or ever the silver cord be loosed, or the golden bowl be broken, or the pitcher be broken at the fountain or wheel broken at the cistern," it was easy to understand "man goeth to his long home and the mourners go about the streets." The mysticism of it all, the majestic, sonorous euphony, and the rhythmic cadence of the verses of the King James version made a strong appeal that fascinated me.

As I grew old I was again attracted to the subject and sought for some writing that would help me better to understand Ecclesiastes. For long the search was in vain. There was a plentiful literature suited to the theologian, but what I wanted was something that would be intelligible to the layman. A short time ago I found what I was after, in three monographs, one by Dr. John Smith,* another by Morris Jastrow, Jr.,† a third by Robert Gordis.‡

* *The Pourtract of Old Age, Wherein is contained a Sacred Anatomy, Both of Sole and Body* (2d ed.; London, 1666).

† *A Translation of Koheleth, i.e., Ecclesiastes* (Philadelphia and London, 1919).

‡ *The Wisdom of Ecclesiastes* (New York: Behrman House, 1945).

The booklet of John Smith is a paraphrase of the first six verses of the twelfth chapter of Ecclesiastes. Dr. Smith would today be called a fundamentalist. He takes every word in its literal sense, regarding it as sacredly inspired. He aims to reconcile his science of anatomy and medicine with religion. Much of his argument and elucidation is labored and extravagant. Some is keen and illuminating. The quaintness of his seventeenth-century English gives savor to what, if expressed in the language of today, would be insipid. Here are a few illustrative excerpts:

He makes a good point about the old man who "shall rise up at the voice of the bird." This means, Dr. Smith says, that the old man who is a poor sleeper rises at the *time* the birds begin their morning twittering, not because they waken him. He could not hear the song of the birds because he is deaf (pp. 126–33).

"Desire shall fail," he says, refers to the "concupiscible appetite." This calls to mind Sir Thomas Browne's rendition of *festina lente:* "Celerity contempered with cunctation."

He has a very clear conception of the circulation of the blood and is warm in his praise of Harvey, whose discovery of the circulation was announced in 1628.

Upon the theme, "And fear shall be in their way," is this penetrating comment:

"Imagination puts a double fallacy upon ancient [i.e., old] men; first it makes them undervalue themselves and minorate their own abilities; and then it makes them overvalue the objects of fear, and make them far greater than they are; like some Perspective glasses [telescopes] that at both ends misrepresent the things seen, yet with a contrary appearance, at one end making them appear lesser, and at a farther distance; and at the other end, greater and nearer than they ought. And hence it is, that they are so timorous upon every the least occasion; that which is said of wicked men, may also be said of old men: They are in great fear where no fear is; Quae finxêre, timent; Psal. 53, 5" (p. 155).

The volumes of Jastrow and of Gordis are based on studies of Hebrew manuscripts and not, as was Smith's book, on the King James version. These two authors, who are scholars well versed in the methods of newer biblical criticism, agree that Ecclestiastes is made up of "a series of causeries," as Jastrow calls it, written by one Koheleth, who, though a "gentle cynic" and a skeptic, is not an atheist. In some way his writings passed the censorship of the learned rabbis of the early days and slipped into the Old Testament, where they did not really belong; for the religious views expressed in the writing were far from orthodox. To offset this mistake, which shocked these rabbis, many interpolations were added in an attempt to make the text less radical and less heterodox. Jastrow and Gordis offer us translations from which these interpolations are omitted. Jastrow by critical research identified 120 such additions in the 222 verses of Ecclesiastes.

Koheleth is shown to be a man who is humanly inconsistent, one who never claims to be otherwise. He belongs to no particular school. He declares the conservatism of old age is not due to greater wisdom that comes with advancing years; it is because the zest for life has gone—"there is no pleasure in them." Therefore, work so that you may enjoy leisure; joy makes life endurable; don't take life too seriously; have a good time; don't try to lay up a vast store of this world's goods, for your heirs will squander it without having done anything to deserve it, etc.

The translations of Jastrow and Gordis may rob Ecclesiastes of some of the charm of the English of the King James version; but they are satisfying; the text has more unity, less inconsistency.

The volume of Gordis (1945) in its format is a beautiful example of book making. It is written in a most attractive style in the idiom of today and is permeated with an affectionate understanding of the personality of "the unknown sage who called himself Koheleth." It can be most warmly recommended to anyone who, not a Hebrew scholar, is looking for a commen-

tary that will help in understanding Ecclesiastes, which Jastrow has called the most fascinating book in the Old Testament, as Job is the most profound and the Song of Solomon the most charming. Gordis stresses the fact that, like Homer, Cervantes, and Shakespeare, Koheleth makes an appeal that is universal, not limited to any one age or nation.

One may admire the Preacher and agree with many of his views, but there is surely more to life than merely to have a good time. We are in this world for some nobler and more serious purpose than to eat, drink, and be merry.

Is it not our duty to develop to the utmost our native capabilities? Is there any greater satisfaction than that which comes from helping others and not living for self alone? After a life activated by such motives we may in our old age rest from our labors, trusting—I often heard the idea expressed in the prayer offered by my father at family worship—"that the world may be the better for our having lived in it." We may then, without regret for the past, face without fear whatever the future may have in store for us.

I close with the words of Weir Mitchell, who wrote what may appropriately be termed the "doctor's farewell":

I know the night is near at hand,
  The mists lie low on hill and bay,
The autumn sheaves are dewless, dry;
  But I have had the day.

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